

NASA-TM-86182 19850023417



Technical Memorandum 86182

TROPOSPHERE-STRATOSPHERE (SURFACE-55 KM) MONTHLY GENERAL CIRCULATION STATISTICS FOR THE NORTHERN HEMISPHERE-FOUR YEAR AVERAGES

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November 1984

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NF00996

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*Contribution Number 19 of the Stratosphere General Circulation with Chemistry
Modeling project at NASA/GSFC

N-155,271

ABSTRACT

This report presents four year averages of monthly mean Northern Hemisphere general circulation statistics for the period from 1 December 1978 through 30 November 1982. Computations start with daily maps of temperature for 18 pressure levels between 1000 and 0.4 mb that were supplied by NOAA/NMC. Geopotential height and geostrophic wind are constructed using the hydrostatic and geostrophic formulae. Fields presented in this report are zonally averaged temperature, mean zonal wind, and amplitude and phase of the planetary waves in geopotential height with zonal wavenumbers 1-3. The northward fluxes of heat and eastward momentum by the standing and transient eddies along with their wavenumber decomposition and Eliassen-Palm flux propagation vectors and divergences by the standing and transient eddies along with their wavenumber decomposition are also given. Large annual and inter-annual variations are found in each quantity especially in the stratosphere in accordance with the changes in the planetary wave activity. The results are shown both in graphic and tabular form.

ACKNOWLEDGMENTS

We are very grateful to Dr. Alvin J. Miller of NOAA/National Meteorological Center for his consultation on the original data set during the course of the data analysis. Thanks are due to Mrs. Roberta M. Duffy for her assistance in the preparation of the manuscript. The collaboration of all the members of the Stratosphere General Circulation with Chemistry Modeling Group is also greatly appreciated.

TABLE OF CONTENTS

	<u>page</u>
ABSTRACT	i
ACKNOWLEDGMENTS.....	ii
TABLE OF CONTENTS.....	iii
LIST OF FIGURES.....	iv
LIST OF TABLES.....	viii
1. INTRODUCTION.....	1
2. DATA AND ANALYSIS PROCEDURES.....	2
3. RESULTS.....	4
3.1 Zonally Averaged Temperatures.....	4
3.2 Zonally Averaged Zonal Winds.....	7
3.3 Planetary Waves.....	9
3.4 Heat and Momentum Fluxes.....	11
3.4.1 Transport of Sensible Heat.....	11
3.4.2 Transport of Westerly Momentum.....	14
3.5 Eliassen-Palm Flux Divergence.....	18
3.5.1 E-P Flux Vectors.....	18
3.5.2 E-P Flux Divergences.....	19
4. SUMMARY.....	22
5. REFERENCES.....	27
6. FIGURES.....	31
7. APPENDIX TABLES.....	95

LIST OF FIGURES

Figure	page
1. Relationship among $z = \ln(p_0/p)$, pressure and geometric altitude scales.....	32
2. Northern Hemisphere four year mean zonally-averaged temperatures $[\bar{T}]$ (K) for the months.....	33
3. Zonally-averaged monthly mean temperature $[\bar{T}]$ (K), (a) time-latitude section at 0.4 mb, (b) time-height section at 75°N.....	34
4. Monthly standard deviations of the zonally-averaged temperature $\sigma([\bar{T}])$ (K) at 1 mb for the period 1 December 1978 through 30 November 1982.....	35
5. Time-latitude section of the zonally-averaged daily temperature $[\bar{T}]$ (K) at 1 mb for the period 1 December 1978 through 30 November 1982.....	36
6. Monthly Northern Hemisphere four year average mean zonal winds $[\bar{u}]$ (m/sec).....	37
7. Zonally-averaged monthly mean zonal wind $[\bar{u}]$ (m/sec), (a) time-latitude section at 0.4 mb, (b) time-height section at 40°N.....	38
8. Time-height section of the mean daily zonal winds $[u]$ (m/sec) at 60°N for the period 1 December 1978 through 30 November 1982.....	39
9. Northern Hemisphere four year mean geopotential height amplitudes (m) of zonal wavenumber one for the months.....	40
10. As in Figure 9, but for wavenumber two.....	41
11. As in Figure 9, but for wavenumber three.....	42
12. Northern Hemisphere four-year mean geopotential height phases of zonal wavenumber one for the months.....	43
13. As in Figure 12, but for wavenumber two.....	44
14. As in Figure 12, but for wavenumber three.....	45
15. Monthly mean geopotential height amplitude (m) of zonal wavenumber one, (a) time-latitude section at 1 mb, (b) time-height section at 60°N.....	46
16. As in Fig. 15, but for wavenumber two.....	47
17. As in Fig. 15, but for wavenumber three.....	48

18. Monthly Northern Hemisphere four year mean northward flux of sensible heat by the standing eddies,49
 $[\overline{v^*T^*}]$ (K m/sec).
19. Northward flux of heat by the stationary eddy zonal wave-number one $[\overline{v^*T^*}]_{m=1}$ (K m/sec).50
20. As in Figure 19, but for wavenumber two.51
21. As in Figure 19, but for wavenumber three.52
22. As in Figure 18, but for the northward flux of heat by transient eddies, $[\overline{v'T'}]$ (K m/sec).53
23. Northward flux of heat by the transient eddy zonal wavenumber one $[\overline{v'T'}]_{m=1}$ (K m/sec).54
24. As in Figure 23, but for wavenumber two.55
25. As in Figure 23, but for wavenumber three.56
26. Northward flux of sensible heat by the standing eddies,57
 $[\overline{v^*T^*}]$ (K m/sec), (a) time-latitude section at 1 mb,
 (b) time-height section at 60°N.
27. Northward flux of heat by the stationary eddy zonal wave-number one $[\overline{v^*T^*}]_{m=1}$ (K m/sec), (a) time-latitude section at 1 mb, (b) time-height section at 60°N.58
28. As in Fig. 27, but for wavenumber two.59
29. As in Fig. 27, but for wavenumber three.60
30. As in Fig. 26, but for the northward flux of heat by transient eddies, $[\overline{v'T'}]$ (K m/sec).61
31. Northward flux of heat by the transient eddy zonal wave-number one $[\overline{v'T'}]_{m=1}$ (k m/sec), (a) time-latitude section at 1 mb, (b) time-height section at 60°N.62
32. As in Fig. 31, but for wavenumber two.63
33. As in Fig. 31, but for wavenumber three.64
34. Monthly Northern Hemisphere four year mean northward flux of eastward momentum by the standing eddies, $[\overline{u^*v^*}]$ (m²/sec²)65
35. Northward flux of eastward momentum by the stationary eddy zonal wavenumber one $[\overline{u^*v^*}]_{m=1}$ (m²/sec²).66
36. As in Figure 35, but for wavenumber two.67

Figure

page

37. As in Figure 35, but for wavenumber three.....68

38. Monthly Northern Hemisphere four-year mean northward flux of.....69
eastward momentum by the transient eddies $[\overline{u'v'}]$ (m^2/sec^2)

39. Northward flux of eastward momentum by the transient eddy.....70
zonal wavenumber one $[\overline{u'v'}]_{m=1}$ (m^2/sec^2).

40. As in Figure 39, but for wavenumber two.....71

41. As in Figure 39, but for wavenumber three.....72

42. Northward flux of eastward momentum by the standing eddies,.....73
 $[\overline{u^*v^*}]$ (m^2/sec^2), (a) time-latitude section at 1 mb,
(b) time-height section at 60°N.

43. Northward flux of momentum by the stationary eddy zonal.....74
wavenumber one $[\overline{u^*v^*}]_{m=1}$ (m^2/sec^2), (a) time-latitude
section at 1 mb, (b) time-height section at 60°N.

44. As in Fig. 43, but for wavenumber two.....75

45. As in Fig. 43, but for wavenumber three.....76

46. As in Fig. 42, but for the northward flux of momentum.....77
by transient eddies, $[\overline{u'v'}]$ (m^2/sec^2).

47. Northward flux of momentum by the transient eddy zonal.....78
wavenumber one $[\overline{u'v'}]_{m=1}$ (m^2/sec^2), (a) time-latitude
section at 1 mb, (b) time-height section at 60°N.

48. As in Fig. 47, but for wavenumber two.....79

49. As in Fig. 47, but for wavenumber three.....80

50. Monthly Northern Hemisphere four-year mean Eliassen-.....81
Palm flux vectors from the standing eddy fluxes.
All of the arrows are the same length. The vertical
vector component is magnified by a factor of 100 with
respect to the horizontal component.

51. As in Figure 50, but for transient eddy fluxes.....82

52. Monthly Northern Hemisphere four-year mean Eliassen-Palm.....83
flux vectors from the standing eddy zonal wavenumber one
All the arrows are the same length. The vertical vector
component is magnified by a factor of 100 relative to the
horizontal component.

53. As in Figure 52, but for wavenumber two.....84

54. As in Figure 52, but for transient eddy fluxes.....85

<u>Figure</u>	<u>page</u>
55. As in Figure 52, but for transient eddy zonal..... wavenumber two.	86
56. Monthly Northern Hemisphere four-year mean Eliassen-Palm..... flux divergences (10^{-5} m/sec ²) resulting from the standing eddies	87
57. As in Figure 56, but for transient eddies.....	88
58. Northern Hemisphere four-year mean Eliassen-Palm flux..... divergences (10^{-5} m/sec ²) resulting from the standing eddy zonal wavenumber one.	89
59. As in Figure 58, but for wavenumber two.....	90
60. As in Figure 58, but for transient eddy fluxes.....	91
61. As in Figure 58, but for transient eddy zonal..... wavenumber two.	92
62. Eliassen-Palm flux divergences (10^{-5} m/sec ²) resulting from the standing eddies, (a) time-latitude section at 5 mb, (b) time-height section at 80°N.	93
63. As in Fig. 62, but for transient eddies, (a) time-..... latitude section at 5 mb, (b) time-height section at 65°N.	94

LIST OF TABLES

<u>Table</u>		<u>page</u>
1	Northern Hemisphere four year mean zonally-averaged.....A-1 temperatures \overline{T} (K), (a) January, (b) February, (c) March, (d) April, (e) May, (f) June, (g) July, (h) August, (i) September, (j) October, (k) November, (l) December.	
2	As in Table 1, but for zonal winds \overline{u} (m/sec).A-3	
3	Northern Hemisphere four year-mean geopotential height.....A-5 amplitudes (m) for the zonal wavenumber one, (a) January, (b) February, (c) March, (d) April, (e) May, (f) June, (g) July, (h) August, (i) September, (j) October, (k) November, (l) December.	
4	As in Table 3, but for zonal wavenumber two.....A-7	
5	As in Table 3, but for zonal wavenumber three.....A-9	
6	Northward flux of heat by the standing eddies.....A-11 $[\overline{v^*T^*}]$ (K m/sec) for Northern Hemisphere 4-year average (a) January, (b) February, (c) March, (d) April, (e) May, (f) June, (g) July, (h) August, (i) September, (j) October, (k) November, (l) December.	
7	Northward flux of heat by the standing eddy zonal wavenumber....A-13 one $[\overline{v^*T^*}]_{m=1}$ for Northern Hemisphere four year average (a) January, (b) February, (c) March, (d) April, (e) May, (f) June, (g) July, (h) August, (i) September, (j) October (k) November, (l) December.	
8	As in Table 7, but for zonal wavenumber two $[\overline{v^*T^*}]_{m=2}$A-15	
9	As in Table 6, but for transient eddies $[\overline{v'T'}]$A-17	
10	As in Table 7, but for transient eddy zonal wavenumber.....A-19 one $[\overline{v'T'}]_{m=1}$.	
11	As in Table 7, but for transient eddy zonal wavenumber.....A-21 two $[\overline{v'T'}]_{m=2}$.	
12	Northward flux of eastward momentum by the standingA-23 eddies $[\overline{u^*v^*}]$ (m^2/sec^2) for Northern Hemisphere 4-year average (a) January, (b) February, (c) March, (d) April, (e) May, (f) June, (g) July, (h) August, (i) September, (j) October, (k) November, (l) December.	

Table

page

13 Northward flux of eastward momentum by the standing eddy.....A-25
zonal wavenumber one $[\overline{u^*v^*}]_{m=1}$ (m^2/sec^2) for Northern
Hemisphere 4-year average (a) January, (b) February,
(c) March, (d) April, (e) May, (f) June, (g) July
(h) August, (i) September, (j) October, (k) November,
(l) December.

14 As in Table 13, but for zonal wavenumber two.....A-27
 $[\overline{u^*v^*}]_{m=2}$.

15 As in Table 12, but for transient eddies $[\overline{u'v'}]$A-29

16 As in Table 13, but for transient eddy zonal.....A-31
wavenumber one $[\overline{u'v'}]_{m=1}$.

17 As in Table 13, but for transient eddy zonal.....A-33
wavenumber two $[\overline{u'v'}]_{m=2}$.

1. INTRODUCTION

Since the early 1970's, the emphasis on stratospheric research has increased considerably. This has been stimulated largely by concerns about the possible depletion of stratospheric ozone due to anthropogenic influences. Several general circulation models which were originally developed for tropospheric studies have now been extended to cover the entire stratosphere and even in some cases the mesosphere (see for example, Schlesinger and Mintz, 1979; Fels et al., 1980; Rind et al., 1984). In addition, a great number of simplified models, either three-dimensional or two-dimensional, have been developed to investigate stratospheric circulations and the associated transports of trace constituents (see for example, Holton and Wehrbein, 1980; Hunt, 1981; Lordi et al., 1980; Cunnold et al., 1980; Harwood, 1980; Butchart et al., 1982; Apruzese et al., 1982; O'Neill et al., 1982; Rood and Schoeberl, 1983a,b; Schneider and Geller, 1984). Of course, observations are needed to validate these models and confirm or deny theoretical hypotheses. The publication by Oort and Rasmusson (1971), entitled "Atmospheric Circulation Statistics," has been used extensively for this purpose mainly for the troposphere. Material included in that publication covers the period from May 1958 through April 1963 at the pressure levels from the surface to 50 mb. Recently, Oort (1983) extended the period of these statistics to 1973. However, both publications included only conventional data from the surface up to the 50 mb pressure level (about 21 km). In recent years, several meteorological satellite instruments which were designed to provide global distributions of stratospheric variables on a daily basis have led to the production of valuable data sets. It should be possible to produce stratospheric general circulation statistics which will be very useful to stratospheric researchers. The main purpose of this publication is to serve

as a convenient source for those who want to obtain a quick look at the mean state of the stratosphere as well as deviations from this mean state and want to use the statistics for comparisons with model results. All of the figures and the tables in this report are directly reproduced from computer output. NCAR graphics software was used for this purpose.

2. DATA AND ANALYSIS PROCEDURES

The basic data set for this report consists of four years (1 December 1978 through 30 November 1982) of Northern Hemispheric temperature and geopotential height data provided by the National Meteorological Center (NMC) at 18 pressure levels (1000, 850, 700, 500, 400, 300, 250, 200, 150, 100, 70, 50, 30, 10, 5, 2, 1, 0.4 mb) taken daily at 12:00 GMT. Below 10 mb the temperatures were derived from rawinsonde data and above that level the measurements were made by the succession of operational satellite sounding systems, namely Vertical Temperature Profiles Radiometer (VTPR) on NOAA 5, Stratospheric Sounding Unit (SSU) on Tiros-N and NOAA 6 and the Tiros Operational Vertical Sounder (TOVS) system on NOAA 6 and NOAA 7. Details of the data analysis techniques can be found in papers by Gelman and Nagatani (1977) and Finger et al. (1965). The satellite temperatures at 5, 2, 1 and 0.4 mb were checked against rocket soundings at 12 rocket stations, and temperature corrections were calculated by Gelman et al. (1982). These temperature corrections give a consistency in the four-year period during which there have been continual changes in both measurement systems and analysis procedures. The original data set was prepared by NMC on a 65x65 hemispheric octagonal grid. The temperatures were interpolated onto a $2.5^{\circ} \times 5^{\circ}$

latitude-longitude grid using a double linear interpolation scheme. Then the temperature fields were corrected using the rocket statistics for the period between 24 September 1978 and 1 September 1981 (see Geller et al., 1983).

The quality of the data has been recently reviewed by Rodgers (1984) who compared the temperature and thickness between rocketsondes, lidar and satellite sounders. He indicated that the data precisions increase from about 7°K to 5°K with the implementation of the SSU on Tiros-N and that the comparison against other analyses are quite reasonable up to about 1 mb. At the 0.4 mb level a significant loss of information occurs and at high latitudes the regression coefficients become more uncertain due to loss of rocket stations such that care must be exercised in the interpretation of the data at these locations.

The pressure heights above 1000 mb were recomputed from the corrected temperature data set using the hydrostatic equation together with the 1000 mb heights as lower boundary values in order to ensure vertical consistency of these two variables. Zonal and meridional wind components were calculated geostrophically at each grid point between 10°N and 85°N . The same procedures were applied to each of the 18 pressure levels and then a meridional latitude-height cross section was constructed. Variables of height and temperature were Fourier analyzed around latitude circles to obtain the wave components.

The zonally averaged values of the monthly mean temperatures and geostrophic zonal winds as well as the eddy heat and momentum transports associated with these winds were calculated for each month. The eddy fluxes were partitioned into standing and transient parts using the same convention as Oort and Rasmusson (1971). The eddy heat and momentum transports were used to evaluate the Eliassen-Palm flux and the flux divergences in the same manner

as Edmon et al. (1980) (see also Dunkerton et al., 1981). The total quantities were separated into standing and transient eddy contributions as well as decomposed into wave number components.

Before proceeding with the results sections of this paper, we will first remark on the vertical scale used in our presentation. To each figure we indicate both pressure (p) and the pressure scale heights defined as $z = \ln(p_0/p)$ where $p_0 = 1000$ mb). Figure 1 shows how z values correspond to altitudes in pressure and approximately in height units. The geometric altitude variation with pressure has been taken from the 1976 U.S. Standard Atmosphere (NOAA, 1976).

3. RESULTS

3.1 Zonally Averaged Temperatures

Figure 2 shows the four year mean values of the zonally averaged temperature $[\bar{T}]$ for the twelve calendar months. The following points are seen in these temperature cross sections.

(a) The temperature of the polar upper stratosphere at about $z=6.9$ or 48 km is maximum (about 283 K) in June and July and minimum (about 242 K) in October-December. The lower stratosphere polar region is coldest (about 198 K) in January at about $z=3.5$ or 24 km. Based on one year (1970/71) SCR (Selective Chopper Radiometer) data, Barnett (1974) reported that the monthly mean temperature at 2 mb (~ 43 km) and 80°N latitude is the highest (274.4 K) in 7 June - 7 July and lowest (233.5 K) in 6 November - 6 December. Our temperatures at the same location give the highest value of 275.8 K in June and lowest reading of 230.6 K in November, which are close to his.

(b) The tropical tropopause temperature is lowest (about 196 K) in January and February, and highest (about 203 K) in July and August.

(c) Generally speaking, between $z=3.6$ and 5.7 or 25 and 40 km, temperature decreases poleward from January through April. In May the North-South temperature gradient becomes almost flat. In the months of June, July, and August the North-South temperature gradient is reversed from that during the January-April period with temperatures increasing toward the pole. During the period September until December, temperature decreases again toward the North Pole. The North-South temperature gradient is strongest in December. These features are reflected in the mean zonal wind patterns shown in Figure 6, as is required by the thermal wind relation.

(d) In the winter (December, January and February) lower stratosphere temperature increases with latitude to about 50°N , then decreases poleward.

(e) In February the polar cold region near $z=3$ (~ 21 km) is somewhat lower in altitude but higher in absolute temperature when compared with other winter months (December or January). Also in this month the polar upper stratosphere is relatively warm.

Fig. 3a presents a time-latitude section of the zonally-averaged monthly mean temperature at 0.4 mb. Regions of temperature lower than 255 K and higher than 265 K are shaded. The major points are: (a) the annual cycle is more pronounced in high latitudes than that in low latitudes. (b) the amplitudes (the difference between the highest and the lowest temperature in a year) at 85°N latitude are 32.6 , 24 K, 21.2 K and 26.2 K for the years* 1, 2, 3 and 4, respectively. Thus, the largest interannual difference in annual temperature range is about 11 K. (c) the size of the higher or lower temperature area varies from year to year. For example, the area enclosed by the 265 K isotherm extends through more months in year 2, but extends southward to the

Equator in year 4. The region enclosed by the 255 K isotherm covers the north pole in years 1, 3 and 4, but shifts southward with its center location at about 60°N latitude in year 2.

Fig. 3b shows a time-height section of the zonally-averaged monthly mean temperature at 75°N latitude. Regions of temperature lower than 220 K and higher than 260 K are shaded. We see that during the 4-year period the amplitude of the annual temperature variation ranges from 35.6 K to 39.4 K at $z=6.9$ (1mb) from 25.6 K to 35.7 K at $z=3.5$ (30 mb) and from 22 K to 24.7 K at $z=0$ (1000 mb).

Plots at other pressure levels and latitudes have also been examined (not shown). The results generally indicate that the large interannual variations are in the regions of high latitude upper and lower stratosphere, and middle latitude upper stratosphere, especially in winter.

In order to examine the temperature changes in more detail, the zonally-averaged daily temperature at 1 mb is plotted against latitude for the four year period (see Figure 5). The major points may be noted below.

(a) Temperature in the polar region fluctuates rapidly during the winter season, but remains relatively steady in summer, reflecting the presence or absence of planetary scale waves. In general, April is the transition month when the stratospheric temperature rises sharply from cold winter to warm summer. On the other hand, September marks the beginning of a sharp decline in temperature leading towards winter conditions.

(b) The major wavenumber 2 warming in February 1979 (e.g. Quiroz, 1979) and the wavenumber 1 warming in February 1980 (e.g. Palmer, 1981) were seen

*years 1, 2, 3 and 4 represent the periods of December 1978–November 1979, December 1979–November 1980, December 1980–November 1981, and December 1981–November 1982, respectively.

clearly in the diagrams. There were no major warmings during the winters of 1980-81 and 1981-82.

(c) There is a year-to-year variation in the time evolution of the temperature fields, although the general pattern looks similar year after year. This interannual variation can best be shown in the plots of the standard deviations of the zonally-averaged temperature in time, $\sigma([T])$, presented in Figure 4. Note that the double peaks in the temperature deviation plots are caused by the rapid change of temperature during equinox seasons as pointed out by Barnett (1974).

(d) In summer, the temperature increases monotonically from the equator to the pole, but during winter both the polar and tropic regions are relatively warmer than the middle latitudes (see Figure 5).

3.2 Zonally Averaged Zonal Winds

Figure 6 shows the 4-year averages of the monthly mean zonally averaged zonal wind $[\bar{u}]$ for January through December for the Northern Hemisphere between the latitudes 10°N and 85°N . Regions of easterlies are shaded. The major features are noted below.

(a) In the stratosphere the polar night jet acquires its maximum speed of more than 100 m/sec at about 40°N in December, and then begins to lose strength from January to February, to March, etc. April marks the transition month when the wind starts changing its direction from westerlies to easterlies. The easterlies reach their peak in July with a wind speed of more than 40 m/sec. September marks an opposite transition month in the sense that the upper stratospheric winds become westerly again.

(b) The westerly jet maximum at tropopause levels exhibits year-to-year variations on its speed and location. The wind has a maximum value of more

than 45 m/sec in February and 20 m/sec in July. The location of the jet maximum varies from about 27°N in February to about 45°N in August.

The interannual variation of the zonally-averaged monthly mean zonal wind is portrayed by a time-series plot in Fig. 7, in which a time-latitude diagram of the 0.4 mb (Fig. 7a) and a time-height diagram at 40°N latitude (Fig 7b) are presented. Regions of negative values (i.e easterlies) are shaded. The major points are noted below.

(a) The maximum speed of the polar night jet at the 0.4 mb varies from 91 m/sec to 141 m/sec in the four-year period. The location of the maximum wind is between about 33°N to 48°N latitude. It should be noted that the center of the polar night jet is in the mesosphere, beyond the limit of the present data coverage.

(b) The maximum speed of summer easterlies at the 0.4 mb ranges from -34 m/sec to -49 m/sec with the location of the maximum wind speed changing from about 30°N to 35°N latitude. A secondary peak of the easterlies appears at around 55°N in the years 1,2 and 4 but not in year 3.

(c) From results plotted at other locations (not shown), we find that the maximum wind speeds of the tropospheric jet are 44.4 m/sec at 27°N for year 1, 51.5 m/sec at 29°N for year 2, 46.1 m/sec at 30°N for year 3, and 42.4 m/sec at 27°N for year 4. Thus, the maximum interannual change of the maximum wind speed at the jet core is 9.1 m/sec with latitudinal shift of the jet center only about 3 degrees.

Figure 8 shows the time-altitude section of the daily values of the mean zonal wind at 60°N for a four year period beginning 1 December 1978. These diagrams enable us to examine the detailed evolution of the zonal wind during the course of its annual march. The following points may be noted:

(a) Generally speaking, the winter stratospheric circulation is characterized by strong westerly winds which are replaced by easterlies during summer. The absolute magnitudes of the summer easterlies are less than those of winter westerlies.

(b) The fluctuations of the wind speed are highest in winter in response to the upward penetration of the planetary waves from the troposphere into the stratosphere.

(c) The year-to-year changes in the wind speed and the transition day from westerlies to easterlies are large. Let's examine the transition day (the zero-wind line) which represents the summer easterly circulation displacing the winter westerly circulation in the stratosphere. This day occurred approximately in the middle of April in the first two years (1978/79 and 1979/80), but came earlier in late March in the fourth year (1981/82) and was delayed to early May in the third year (1980/81).

(d) During winter, one sees small patches of easterly winds embedded in the broad area of the westerlies in the middle and upper stratosphere in connection with stratospheric warmings during which the northward transport of heat is enhanced (see Figures 18 and 22).

3.3 Planetary Waves

Figure 9 shows latitude-altitude plots of the Northern Hemisphere amplitude structure of the stationary planetary wave in the geopotential height field with zonal wavenumber one for the months January to December. In the troposphere a maximum in the mid-latitude region appears all the year round, with the largest value of about 158 m in January at about 47°N and the smallest value of about 90 m in July at about 65°N. A secondary maximum occurs in the subtropic latitudes at the tropopause level with the peak value

of 121 m in July. This summer pattern in the subtropics was explained by Van Loon et al. (1973) as due to the vertical pressure distribution caused by the monsoon activity. Our results are quite similar to theirs.

In the stratosphere the seasonal cycle is very pronounced with the maximum amplitude exceeding 1000 m in winter and amplitudes not much more than 100 m in summer. The year-to-year change for winter months is large both in magnitude and location of the maximum amplitude as reported by Geller et al. (1984).

Figure 10 shows the structures of wavenumber two amplitudes. Wave 2 in the stratosphere also has maximum peak amplitudes in winter and minimum peak amplitudes in summer. The average magnitude of the wave 2 maximum is less than half of that of wave 1 and the location of the wave 2 maximum is around 35 km, at least 10 km lower than that of the wave 1 maximum. The wave 3 amplitude is even smaller, being about quarter of wave 1 in the upper stratosphere as shown in Figure 11, but still shows a seasonal cycle with a minimum in summer and maximum in winter both in the stratosphere and the troposphere. It is of interest to note that the magnitude of the wave 3 amplitude is generally large in the troposphere with respect to that in the stratosphere.

Another point should be mentioned. In winter, although the magnitude of wave one, two and three are comparable at the tropopause level, the wave 1 amplitude grows much faster with altitude than that of either wave 2 or 3. This was pointed out by O'Neill et al. (1982) as illustrating the limited vertical penetration of waves 2 and 3 into the stratosphere from the troposphere as compared with wave 1. The wave 1 phase tilts westward with

height much more than that of wave 2 or 3 during winter as is shown in Figures 12-14, indicating that the wave 1 vertical energy flux penetrates more deeply into the stratosphere in agreement with the theory of Charney and Drazin, (1961).

The interannual variability in the geopotential height amplitude can be seen in Figs. 15-17. The top panels of these figures (Fig. 15a, 16a, 17a) present the time-latitude sections of the monthly mean planetary wave amplitudes for wavenumbers 1, 2 and 3 at 1mb, while the bottom ones (fig. 15b, 16b, 17b) depict the time-height sections of the wave amplitudes at 60°N latitude. Looking at Fig. 15a one sees that the maximum wave 1 amplitude is the largest (1135m) in year 1 and smallest (872 m) in year 3. The difference is 263 m. The locations of the maxima also change from year to year. Fig. 15b gives another view of the year-to-year changes in the wave amplitude. Another noteworthy feature is the presence of two peaks in wave 1 amplitude every year, one peak occurring in late fall and the other in middle winter.

The maximum amplitude of wave 2 at 1 mb is 247 m in year 4 and 530 m in year 3. The difference is 283 m (see Fig. 16a). The locations of the maxima vary from year to year (Fig. 16). The wave 3 maximum amplitude also shows large interannual variations (Fig. 17). The value of the wave 3 maximum amplitude ranges from 121 m in year 3 to 185 m in year 2 at 1 mb. The difference is 64 m.

3.4 Heat and Momentum Fluxes

3.4.1 Transport of Sensible Heat

Figure 18 shows altitude-latitude plots of the four year mean northward flux of sensible heat by the standing eddies for the months of January through December. The standing eddy transport of heat $[\bar{v}^*T^*]$ exhibits a pronounced

annual cycle with a strong maximum of about 154 K m/sec in mid-winter (see Geller et al., 1983). The strength of the northward flux in the region north of 40°N is reduced to about 10 K m/sec in April and by May the heat flux in the upper stratosphere in high latitudes becomes southward. This southward transport of sensible heat lasts for the entire summer, although the amount of transport is very small. In September the heat flux in middle and high latitudes begins northward again. The northward heat flux builds its strength beginning in October and reaches a secondary maximum of about 90 K m/sec in November. Looking at Figure 9, we see that the maximum amplitude of planetary wave 1 in November is the second highest for our four-year data set. In December, the northward flux declines but regains its strength during the next month reaching its highest value in January. In low latitudes, there is a southward flux appearing during the entire year, but its value is small. This flux occurs below about 30 km and south of about 30°N in winter. In early spring this region of southward heat flux extends up to 55 km, the highest level of the data set. Subsequently, the northern boundary of this negative area moves toward the north, reaching about 55°N in May and remains there throughout the summer in the middle stratosphere. During the fall, this negative area covers the entire stratosphere and upper troposphere, but its northern boundary moves back to about 30°N.

Looking at the contributions of wavenumbers one, two, and three (see Figures 19-21), we see that wave 1 dominates the transport in October-April when it is appreciable. This is consistent with the annual cycle of the planetary wave amplitudes.

Figure 22 shows altitude-latitude plots of the northward transport of sensible heat by the transient eddies $[\overline{v'T'}]$. In low latitudes the transport is small and southward in some areas. In middle and high latitudes we see two

maxima of poleward heat transfer, one in the upper stratosphere with the center of the maximum between about 55°N to 75°N and the other in the troposphere with a maximum value located between 42°N and 55°N . The stratospheric maximum shows a pronounced annual cycle with a peak value in February and negligible values during summer. In contrast, the tropospheric maximum remains relatively constant throughout the year.

As for the contributions from wave components, we find the following (see Figures 23-25): (1) In the stratosphere, both waves 1 and 2 play important roles in the heat transfer during the period from October through March with wave 1 having the relatively larger influence. The contribution from wave 3 is only noticeable in winter. (2) In the troposphere, the heat transport is mainly accomplished by the wavenumbers higher than 3 (not shown).

The interannual variation of the sensible heat by the standing eddies for the period December 1978 - November 1982 is presented in Fig. 26. The top figure (Fig. 26a) shows a time-latitude section of the monthly mean heat flux at 1 mb, while the bottom figure (Fig. 26 b) gives a time-height section at 60°N . The contributions to this flux by the zonal wavenumbers 1, 2 and 3 are depicted in Figs. 27-29. The major points are noted below.

(a) The northward flux of sensible heat is strongest in the winter of year 2 with a maximum value of about 173 K m/sec at 62.5°N , and weakest in the winter of year 4 with a maximum of about 107 K m/sec at 70°N . The ratio between these two extreme fluxes is about 1.6.

(b) It is difficult to assess the year-to-year changes of the southward heat flux, since the magnitude of this flux is very small. Based upon present calculations, the magnitude of the maximum southward heat flux ranges from -1 K m/sec to less than -0.5 K m/sec during summer.

(c) The interannual variability of the northward heat flux is closely

associated with the year-to-year changes of the geopotential height waves, as can be seen by comparing Figs. 27-29 with Figs. 15-17. In these diagrams, one can also see the dominant effect of zonal wavenumber one transport in the field of $[\bar{v}^* \bar{T}^*]$.

The year-to-year changes of the sensible heat transport by the transient eddies over the four-year period can be seen in Fig. 30 in which a time-latitude section at 1 mb and a time-height section at 60°N latitude are presented. The transports by the zonal wavenumbers 1, 2, and 3 are displayed in figs. 31-33. The following major points are noted.

(a) The largest maximum value of the transient heat flux at 1 mb is 145 K m/s at 75°N appearing in winter of year 4, and the smallest maximum is about 46 K m/s at 62.5°N appearing in winter of year 3. the ratio of these two maxima is greater than three.

(b) The interannual variations in the transport fields by the wave components are large in the stratosphere. The year-to-year difference in the magnitude of the maximum northward heat flux differs from one wave component to the other. For wave 1, the largest maximum value is in year 4, the second largest maximum is in year 2, the third one is in year 3, and the smallest maximum is in year 1. For wave 2, the order is year 4, 1, 2 and 3, and for wave 3, the order is year 2, 1, 4 and 3.

3.4.2 Transport of Westerly Momentum

Figure 34 shows altitude-latitude plots of the northward transport of westerly momentum by the standing eddies $[\bar{u}^* \bar{v}^*]$. Generally, southward flux appears in low latitudes above about 20 km and in middle and high latitudes below about 20 km. This pattern persists all year round but the intensity fluctuates from season to season. In low latitudes the largest negative

values of $[\overline{u^*v^*}]$ are on the order of $-60 \text{ m}^2/\text{sec}^2$ in winter. Values of about $-35 \text{ m}^2/\text{sec}^2$ occur in fall and minimum values of about $-25 \text{ m}^2/\text{sec}^2$ occur in summer. In the middle and high latitude lower altitude region the largest negative values occur in winter, the smallest values in summer with intermediate values in spring and fall. For the northward flux of momentum, the results show that large values appear in the middle and high latitudes above about 20 km altitude during the period October through March. This northward westerly momentum flux exhibits a larger annual variation than does the southward flux. The largest value of $[\overline{u^*v^*}]$ is over $250 \text{ m}^2/\text{sec}^2$ and occurs in January with the smallest value of less than $5 \text{ m}^2/\text{sec}^2$ appearing in July and August.

With regard to the contributions from each wave component (see Figures 35-37) we find that for the northward flux in the middle and upper stratosphere wave 1 dominates the situation during the period of October through March. However, the southward flow in low latitudes seems to be produced by wavenumbers higher than 3.

Figure 38 shows altitude-latitude plots of the northward transport of westerly momentum by the transient eddies $[\overline{u'v'}]$. In the diagrams of $[\overline{u'v'}]$ two maxima of poleward momentum transfer are present, one in the upper stratosphere between about 40°N and 55°N and the other in the upper troposphere with a well defined center between about 32°N and 42°N . The upper stratospheric feature shows a pronounced annual cycle with highest values of over $200 \text{ m}^2/\text{sec}^2$ in late winter and negligible amounts of transport during summer. The tropospheric feature appears throughout the year with its largest value of $[\overline{u'v'}]$ being about $43 \text{ m}^2/\text{sec}^2$ in March and a smallest value of about $16 \text{ m}^2/\text{sec}^2$ in August. These two maxima are associated with the polar night jet and the tropospheric westerly jet, respectively. A southward flux of westerly

momentum occurs in high latitudes. This southward flux is confined to the troposphere and the lower stratosphere in January and October, but extends to 55 km in February, March, November and December, and shrinks to a narrow band having its center around 60°N and with very weak intensity during summer.

Figures 39-41 depict the contributions of each wavenumber component to the total transient eddy transport of westerly momentum. It is found that for the northward transport of westerly momentum in middle latitudes upper stratosphere during the period from October through March both wave 1 and wave 2 play almost equally important roles. In addition, wave 3 also contributes a sizeable amount to the total transient eddy transport. However, the northward transport of momentum in the upper troposphere is carried out by wavenumbers higher than 3. The southward momentum transport in the polar region during the period from November to March seems to be dominated by wave 1.

The monthly mean transport of westerly momentum by the standing eddies over the 4-year period is presented in Fig. 42. The top figure (Fig. 42a) shows a time-latitude section at 1 mb, while the bottom figure (fig. 42b) displays a time-height section at 60°N latitude. The momentum transports by the zonal wavenumbers 1, 2 and 3 are shown in Figs. 43-45. With regard to the interannual variations of these transports, the following points may be noted.

(a) The maximum value of northward transport of momentum at 1 mb ranges from 234 m²/sec² in year 4 to 359 m²/sec² in year 2. Based on more detailed plots (not shown) we find that the location of the maxima shifts by about 13 degrees between about 52°N to 65°N in the 4-year period.

(b) The maximum southward flux of momentum at 60°N latitude in the troposphere varies from about -22 m²/sec² in year 3 to about -44 m²/sec² in year 1 (see Fig. 42 b), about a factor of 2 difference.

(c) The interannual variations of the momentum transports by the wave components in the stratosphere follows closely the changes of the geopotential height amplitudes that are shown in Figs. 15-17.

The monthly mean transport of westerly momentum by the transient eddies over the four-year period is presented in Fig. 46. The top figure shows a time-latitude section at 1 mb, while the bottom shows a time-height section at 60°N latitude. The transports by the zonal wavenumbers 1, 2 and 3 are displayed in Figs. 47-49. The major features of the interannual variation in the transient eddy transport of momentum are as follows.

(a) The maximum value of northward momentum flux at 1 mb ranges from 128 m^2/sec^2 in year 3 to 249 m^2/sec^2 in year 4, about a factor 2 difference. The location of the maximum value is between 45 and 57.5°N latitude.

(b) The interannual changes of the transports by wavenumbers 1, 2 and 3 are also large. As a matter of fact, the difference between the year with the largest maximum value of $[\overline{u'v'}]$ and the year with the smallest maximum value of $[\overline{u'v'}]$ can be more than a factor of 5 (see Fig. 47a).

(c) We noted earlier that both waves 1 and 2 contribute about equally to the total transient eddy transport field. Looking at individual years, one finds that in year 4, wave 1 dominates the transport (Fig. 47a), but in year 1 and 2, wave 2 actually transports more momentum northward in winter at 1 mb than does wave 1. (Fig. 48a)

(d) The year-to-year change of the wave 3 transport can vary by up to a factor of 2 or more, which is less than that from wave 1. (fig. 49a).

3.5 Eliassen-Palm Flux Divergences

3.5.1 E-P Flux Vectors

The four year mean December, January, and February E-P flux vectors due to standing eddies were presented in Geller et al. (1983) in which the following features were shown: the fluxes are upward from the surface up to about 20 km centered at 45-50°N; to the south the vectors bend equatorward and slightly downward below about 14 km; to the north, some flux is downward into the polar troposphere and some is upward into the polar stratosphere where it joins the general equatorward flow in the middle and upper stratosphere. However, during summer months, the E-P flux vectors become disorganized (see Figure 50). They do not point upward in middle latitudes, rather, they show some downward propagation in the troposphere as reported by Edmon et al. (1980). In early and middle spring, the direction of E-P flux is still upward following the winter E-P flux pattern, but not in May. Subsequently, the fluxes become disordered as the summer season pattern is established as is described above. Beginning in September, the E-P flux starts to show upward propagation again and by October the well organized upward propagation structure has been established. Then the winter circulation follows. Thus, the yearly cycle is completed.

In addition to the general picture described above, there are two special features that should be noted:

(a) Divergence Line - During the period from May through August one sees two divergence lines in the stratosphere, one at about 40°N and the other at around 60°N in Figure 50. The divergence line at 60°N disappears in September and neither of these features exists during the period October through March.

(b) Convergence Line - As pointed out in Geller et al. (1983) a convergence line exists between 20°N and 35°N above 21 km in winter. This

convergence line is seen in March but is not seen in April, May and during the summer months. It returns in September and remains throughout the fall and winter.

Figure 51 presents the E-P flux vectors from the transient eddies. Generally speaking, in winter the transient eddy fluxes resemble those from the standing eddies over most of the stratosphere except for the following features. First, the convergence line at 20-35°N reported for the standing eddy case is not seen for the transient eddy flux vectors. Secondly, the bifurcation shown in January over the polar lower stratosphere in the standing eddy plots (Figure 50) does not exist in the transient eddy diagrams. These two vector patterns differ more in summer than in winter. During summer one finds that the standing eddy vectors are disorganized, and in some regions downward fluxes are seen; however the transient eddy fluxes still appear to be well organized with a generally upward component.

The contributions of the various wave components to the total eddy E-P flux vectors are shown in Figures 52-55. We may roughly classify the vector fields into two categories based on the time of the year. The vector patterns for October, November, December, January, February, and March may be put in the first category (C1) and the patterns for the other months of the year may be grouped into the second category (C2). In C1 one sees that the total fields bear great resemblance to those due to either wave 1 or wave 2 or their combination but not in C2. This is consistent with annual variations in the planetary wave activity.

3.5.2 E-P Flux Divergences ($\nabla \cdot F$)

The annual variation of the E-P flux divergence from the standing eddies is presented in Figure 56. Generally speaking, high values

of $\nabla \cdot F$ appear during the months of October, November, December, January, February, and March with low values in April, May, June, July, August, and September. The largest values occur in the high latitude stratosphere, intermediate values in the mid-latitude upper stratosphere, and smallest values in the remaining areas except in the high altitude tropics where the results may be untrustworthy. The high latitude stratosphere has the strongest seasonal variation with a maximum positive value of about 25 m/s/day at about 35 km and a maximum negative value of less than 0.5 m/s/day (either positive or negative) in summer. The regions in the mid-latitude upper stratosphere show a similar annual cycle (with opposite sign, however), to that in the high latitude stratosphere but with smaller amplitude while in the remaining areas the annual change is much less. Figure 57 shows the E-P flux divergences from the transient eddies. In this figure we see a broad shallow convergence region in the middle and high latitude troposphere. This convergence is seen to be due to wavenumbers higher than three by examining the wave number decomposition (see Figures 60-61). Edmon et al. (1980) have shown the same feature in their figure 1. Based on our computations we note that the largest negative values of about -7.8 m/s/day occur in the middle spring and fall, smallest negative value of around -5 m/s/day in summer and with medium negative values in winter. Above this shallow convergence zone there is a divergence area with values of $\nabla \cdot F$ ranging from 1.6 to 4.6 m/s/day appearing during the period from November to March. In the upper stratosphere and in the middle and high latitudes, large negative values of $\nabla \cdot F$ are seen. This upper stratospheric convergence zone shows large seasonal variation with maximum negative values of about -10 m/s/day in January and minimum negative values in summer. In terms of wavenumber contribution, it is found that in the stratosphere during the months October to April that wave 1 has the

largest influence both in the standing and transient eddy divergence fields while in the troposphere wavenumbers higher than three have a greater effect on the transient eddy divergence fields but not on the standing eddy counterparts. These features are presented in Figures 58-61.

The E-P flux convergences from the standing and the transient eddies for the four winters (1978/79, 1979/80, 1980/81, 1981/82) were shown by Geller et al. (1984). Here, we present two sections of the convergence fields over the entire four-year period. Fig. 62 shows a time-latitude plot at 5 mb and a time-height plot at 80°N latitude of the monthly mean standing eddy E-P flux convergence. The selection of 5 mb and 80°N latitude is based on the fact that the magnitude of the convergence at these locations are relatively large. The major features regarding the interannual variation are: (1) the values of the E-P flux divergence at 5 mb are 25, 44, 23 and 40 m/s day for years 1, 2, 3 and 4 (Fig. 61a), about a factor of 2 change within the four years of data examined; (2) the year-to-year changes of the E-P flux convergence field is rather difficult to assess, because the maximum value of the convergence appears to be located in the mesosphere beyond the present data limit.

Fig. 63 is similar to Fig. 62, but for the transient eddies at 5 mb and 65°N latitude. The major points are: (1) the interannual change of the E-P flux divergence is about a factor of 2, almost the same as the standing eddy case, but the magnitude of the transient eddy divergence at 5 mb is about one-fourth of that from the standing eddies; (2) the year-to-year change in the convergence field in the upper stratosphere is also about a factor of about 2. Again, additional data in the mesosphere are needed to investigate its

interannual variability; (3) as noted earlier, there is a convergence area in the lower troposphere. The magnitude of the convergence at 65°N latitude is around -5 m/s day which changes slightly from year to year (Fig. 63b).

4. SUMMARY

The major features of interest for various quantities are summarized below.

(a) With regard to zonal mean temperature:

(1) The largest amplitude in the annual cycle occurs in the high latitude upper stratosphere. The results show that the amplitude of the temperature may reach 50 K at the 2 mb level at 85°N latitude.

(2) The north-south temperature gradient above 25 km is strongest in December.

(3) The temperature in the polar region fluctuates rapidly during winter but remains relatively steady in summer.

(4) April is the transition month when stratospheric air temperatures rise sharply from their cold winter values to warm summer values with September marking the beginning of the sharp decline in temperature leading towards winter conditions.

(5) Large interannual changes in the temperature field are found in the high latitude upper and lower stratosphere. The present data show that the difference between the largest and the smallest amplitudes of the annual temperature cycle in the four years is about 11 K.

(b) With regard to mean zonal wind:

(1) The stratospheric jet (or polar night jet) has its maximum speed of more than 100 m/sec in December with winds blowing from west to east. The westerlies begin losing their strength from January through

March. Beginning in April the winds change their direction from westerlies to easterlies with the highest westward flow speeds being around 40 m/sec appearing in July. September marks an opposite transition month in the sense that the winds begin to blow from the west again.

(2) The tropospheric jet changes its intensity and location annually. The maximum speed of the jet is about 45 m/sec in February at about 28°N and the minimum speed is about 20 m/sec in July at about 44°N .

(3) The interannual variation of the stratospheric jet is larger than that of the tropospheric jet. At the 0.4 mb level, the results show that the maximum speed of the westerlies varies from 91 m/sec to 141 m/sec during the four-year period and the maximum speed of summer easterlies ranges from -34 m/sec to -49 m/sec. The location of the maximum wind moves about 15 degrees in latitude for the westerlies and about 5 degrees for the easterlies during the four-year period. On the other hand, the year-to-year change of the maximum wind speed at the tropospheric jet core is about 9 m/sec with the center location shifting about 3 degrees in latitude.

(c) With regard to planetary waves:

(1) The annual cycle in wave 1 is very pronounced in the stratosphere with a maximum amplitude of more than 1000 m in winter and a minimum amplitude of about 100 m in summer for the four years of data studied. In the troposphere, wavenumber 1 has two maxima, one at around 25°N , the other at about 45°N . The subtropic maximum has a seasonal cycle with its largest value of about 120 m occurring in summer and its smallest value of about 50 m occurring in winter. The mid-latitude maximum has the largest value of about 158 m in January and smallest value of around 90 m in July.

(2) The annual variation of wave 2 in the stratosphere has a peak amplitude also in winter and minimum in summer but the magnitude of the wave 2

amplitude is less than half of that of wave 1 for the years studied.

(3) The wave 3 amplitude is about a quarter of wave 1 but still shows a seasonal cycle with a minimum in summer and a maximum in winter.

(4) Based on the present four-year data set, it is found that wavenumber one has a maximum amplitude of 1135 m and a minimum amplitude of 872 m, wavenumber two has largest and smallest amplitudes of 530 m and 247 m, respectively and wavenumber three has the largest and the smallest amplitudes of 185 m and 121 m. Thus, the wavenumber two has a larger year-to-year percentage variation than either wavenumbers one or three.

(d) With regard to heat transport:

(1) The standing eddy transport of heat exhibits a pronounced annual cycle in the middle and high latitude stratosphere. During winter the flux is poleward with a maximum value of 154 K m/sec appearing in January at about 42 km 65°N but in summer the flux changes its direction toward the equator with its absolute value being around 1 K m/sec. At low latitudes there is a southward flux region appearing all year round but its magnitude is small.

(2) The transient eddy transport of heat also shows a large annual variation in its flux intensity in the upper stratosphere with largest poleward fluxes being about 83 K m/sec in February and the smallest flux, less than 1 K m/sec occurring in summer.

(3) Both planetary wavenumbers 1 and 2 have substantial contributions to the total transport of heat with wave 1 having the relatively greater influence. These waves dominate the transport in the period from October through April but not during the rest of the months of the year, consistent with the annual cycle of the planetary wave activity.

(4) The interannual variation of the horizontal heat flux due to

the standing eddies follows closely the year-to-year changes of the geopotential height waves, but to a lesser degree for the transient eddy case. The variability is larger in the stratosphere than that in the troposphere. The interannual variation of the transient eddy transport is larger than the standing eddy transport.

(e) With regard to momentum transport:

(1) The standing eddy transport of westerly momentum has two primary maxima, one near the polar night jet and the other in the vicinity of the tropospheric jet stream. The stratospheric transport has its maximum value of over $250 \text{ m}^2/\text{sec}^2$ appearing in January with its center location in the mesosphere. This transport drops to almost zero in summer. The tropospheric transport has its maximum value of more than $20 \text{ m}^2/\text{sec}^2$ occurring in March and October but diminishes to a very small quantity in winter.

(2) The transient eddy transport also has two maxima similar to the standing eddy transport counterpart. The stratospheric transport shows an annual cycle with an amplitude of over $200 \text{ m}^2/\text{sec}^2$. The tropospheric transport persists all the year round, but its magnitude varies from season to season with a maximum value of about $43 \text{ m}^2/\text{sec}^2$ appearing in March and a minimum value of about $16 \text{ m}^2/\text{sec}^2$ in August.

(3) In the stratosphere, wave number 1 dominates the westerly momentum transport during the period from October through March in the case of standing eddy transport, but both waves 1 and 2 play almost equal roles in the transient eddy momentum transport. In the troposphere the northward transport of momentum by the standing eddies is almost all accounted for by the first three harmonics of planetary waves. However, the transport by the transient eddies is carried out by wavenumbers higher than three.

(4) The interannual change in the momentum transport by the standing or transient eddies is about a factor of 2 at the 2 mb level with the center of the maximum flux shifting about 13 degrees in latitude during the four-year period.

(f) With regard to Eliassen-Palm flux divergences:

(1) The annual variation in E-P flux divergence resulting from the standing eddies is strongest in the high latitude stratosphere with a maximum positive value of about 25 m/s/day at about 35 km and a maximum negative value of over -30 m/s/day at or above 55 km appearing in January and minimum values of less than 0.5 m/s/day appearing in summer.

(2) The transient E-P flux divergence has a large seasonal variation in the high latitude upper stratosphere with maximum negative values of about -10 m/s/day occurring in January and minimum negative values close to zero in summer. In the troposphere, a broad shallow convergence region appears in middle and high latitudes. This convergence persists throughout the year but varies in magnitude from -7.8 m/s/day occurring in middle spring and fall to -5 m/s/day in summer.

(3) The annual changes in the E-P flux divergence (or convergence) reflect the changes in planetary waves 1 and 2 in the stratosphere but not in the troposphere.

(4) The E-P flux divergences at 5 mb vary interannually by as much as a factor of 2 for both the standing and transient eddies. However, the magnitude of the transient eddy divergence is about a quarter of the standing eddy divergence. The year-to-year change in the convergence field in the upper stratosphere is difficult to determine, since the maximum value is in the mesosphere. The interannual variability of the tropospheric convergence is small.

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6. FIGURES

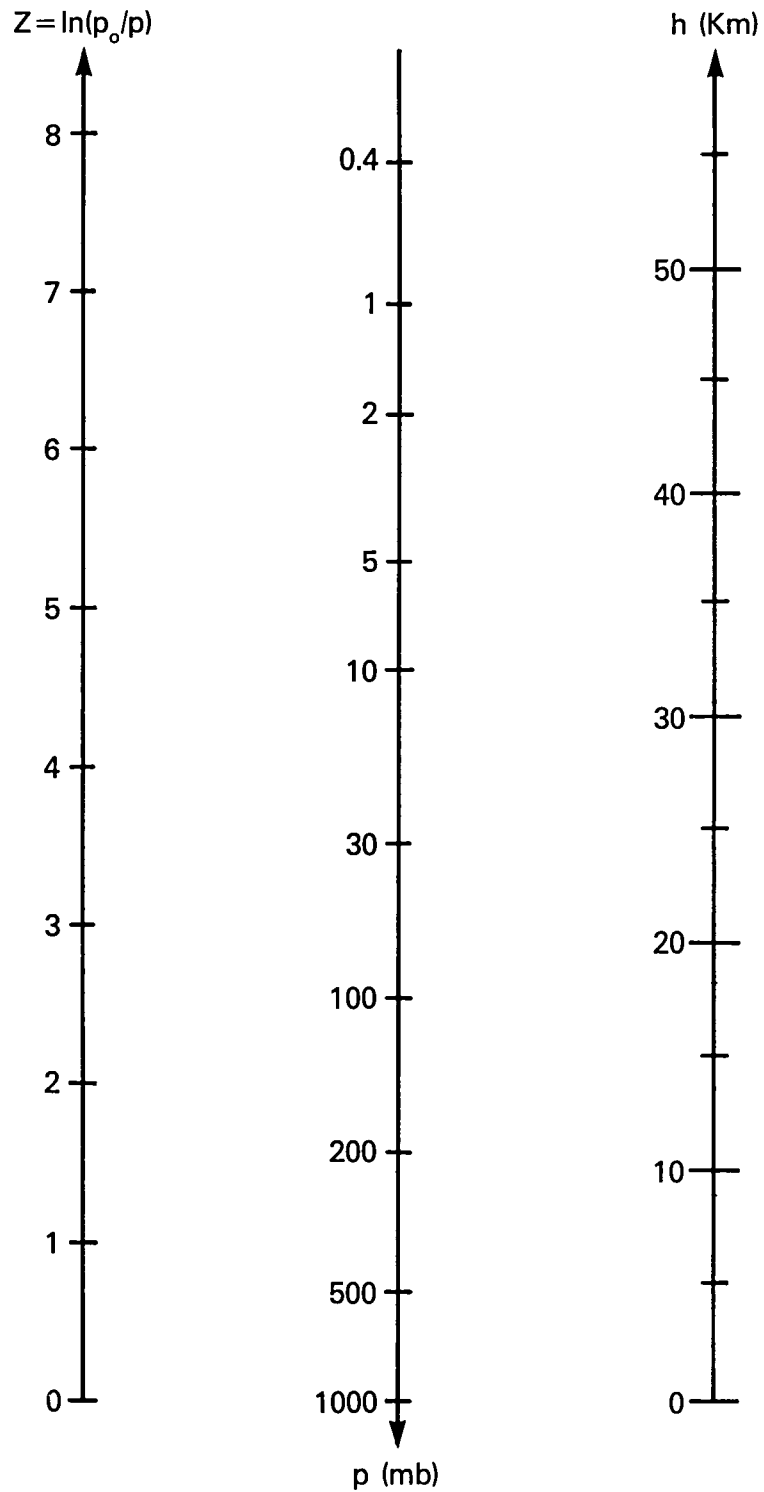


Fig 1. Relationship among $z = \ln(p_0/p)$, pressure and geometric altitude scales.

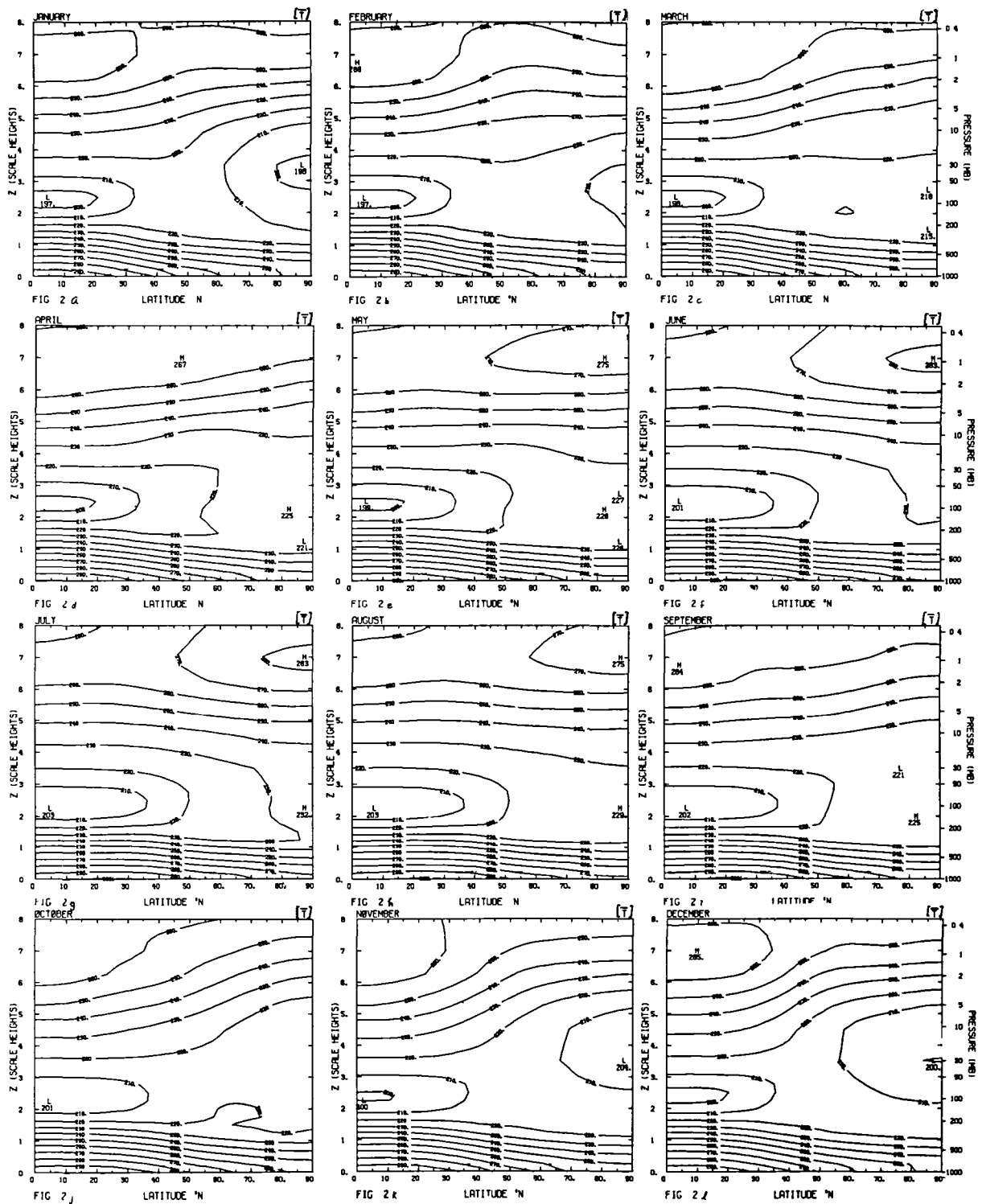


Fig 2. Northern Hemisphere four year mean zonally-averaged temperatures $[T]$ (K) for the months.

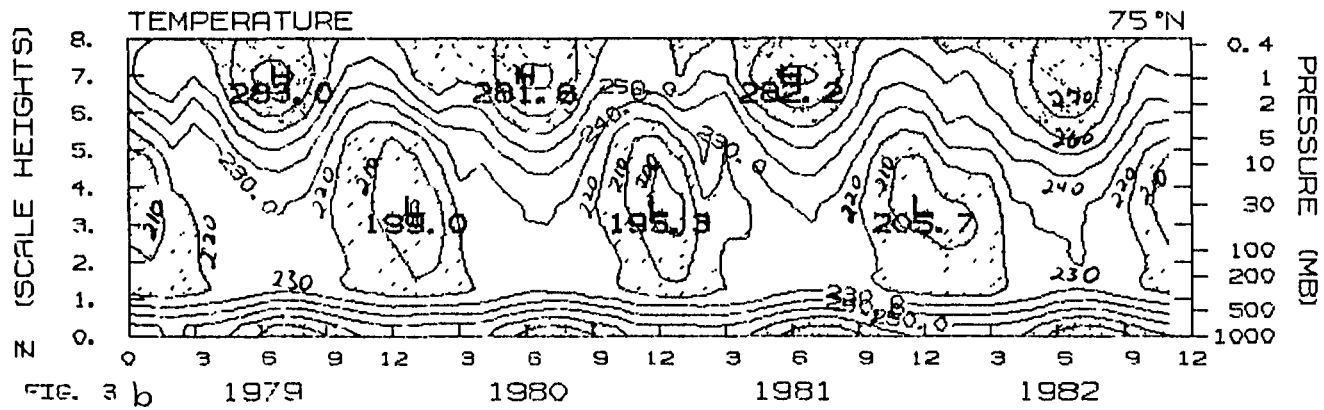
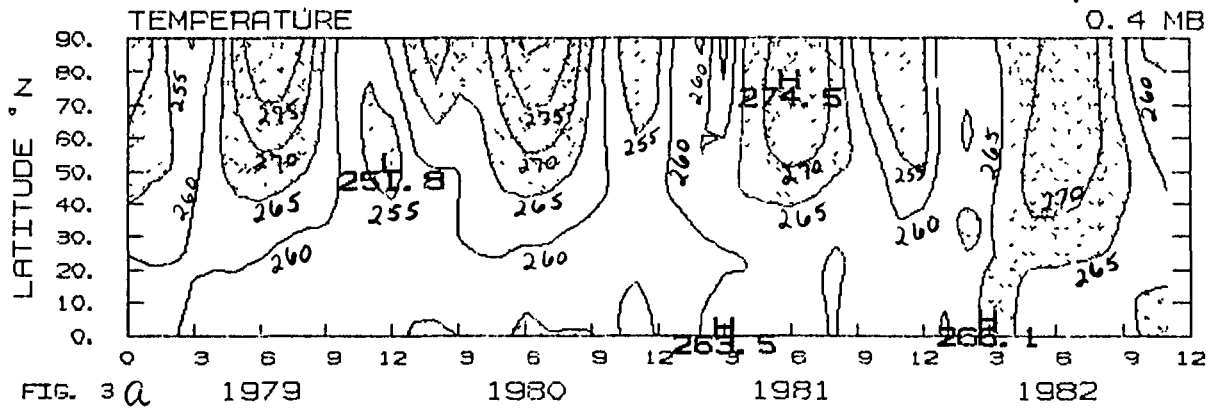


Fig 3. Zonally-averaged monthly mean temperature $[\bar{T}]$ (K), (a) time-latitude section at 0.4 mb, (b) time-height section at 75°N.

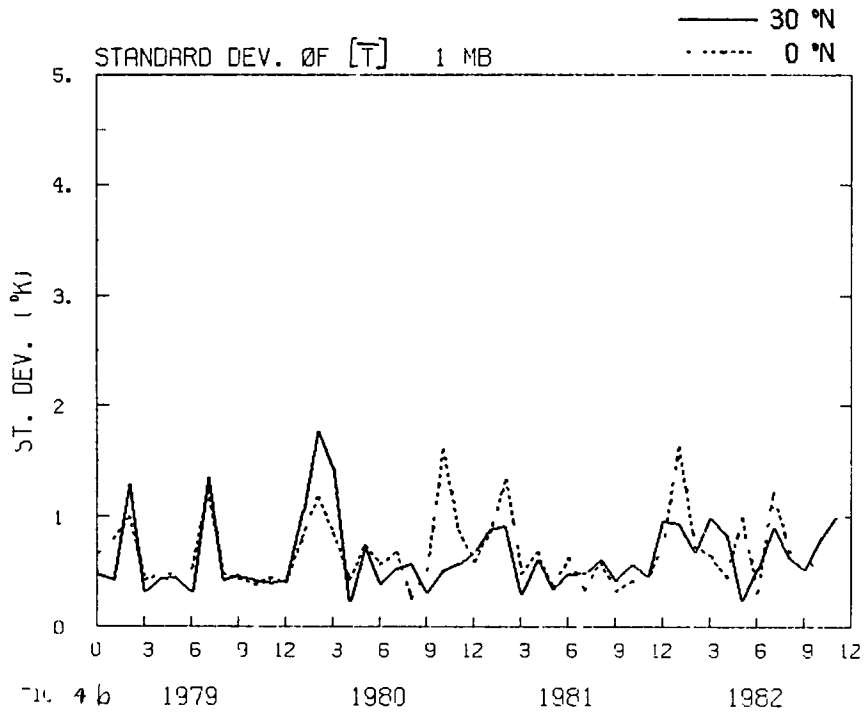
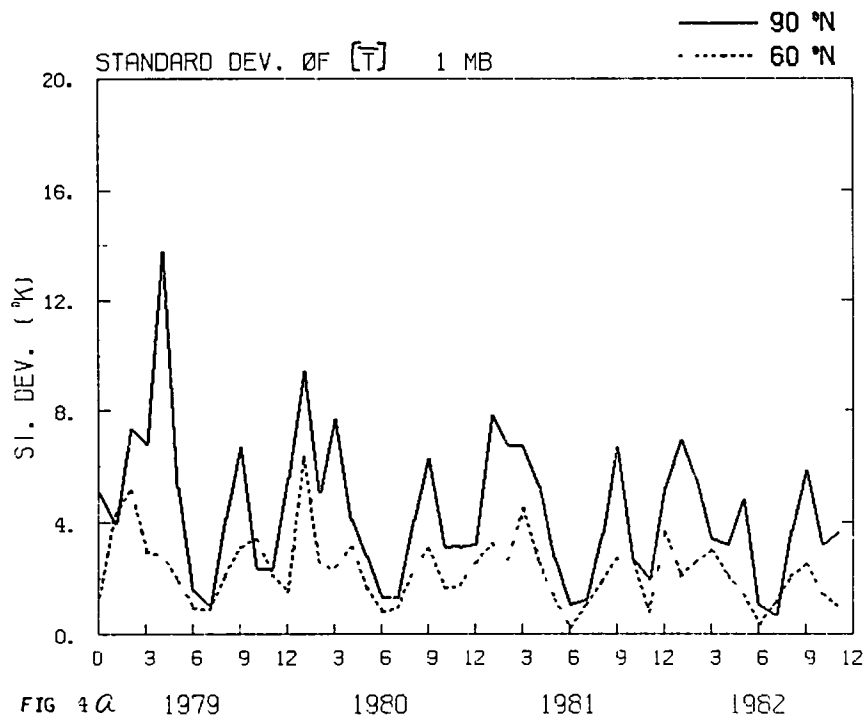


Fig 4. Monthly standard deviations of the zonally-averaged temperature $\sigma ([T])$ (K) at 1 mb for the period 1 December 1978 through 30 November 1982.

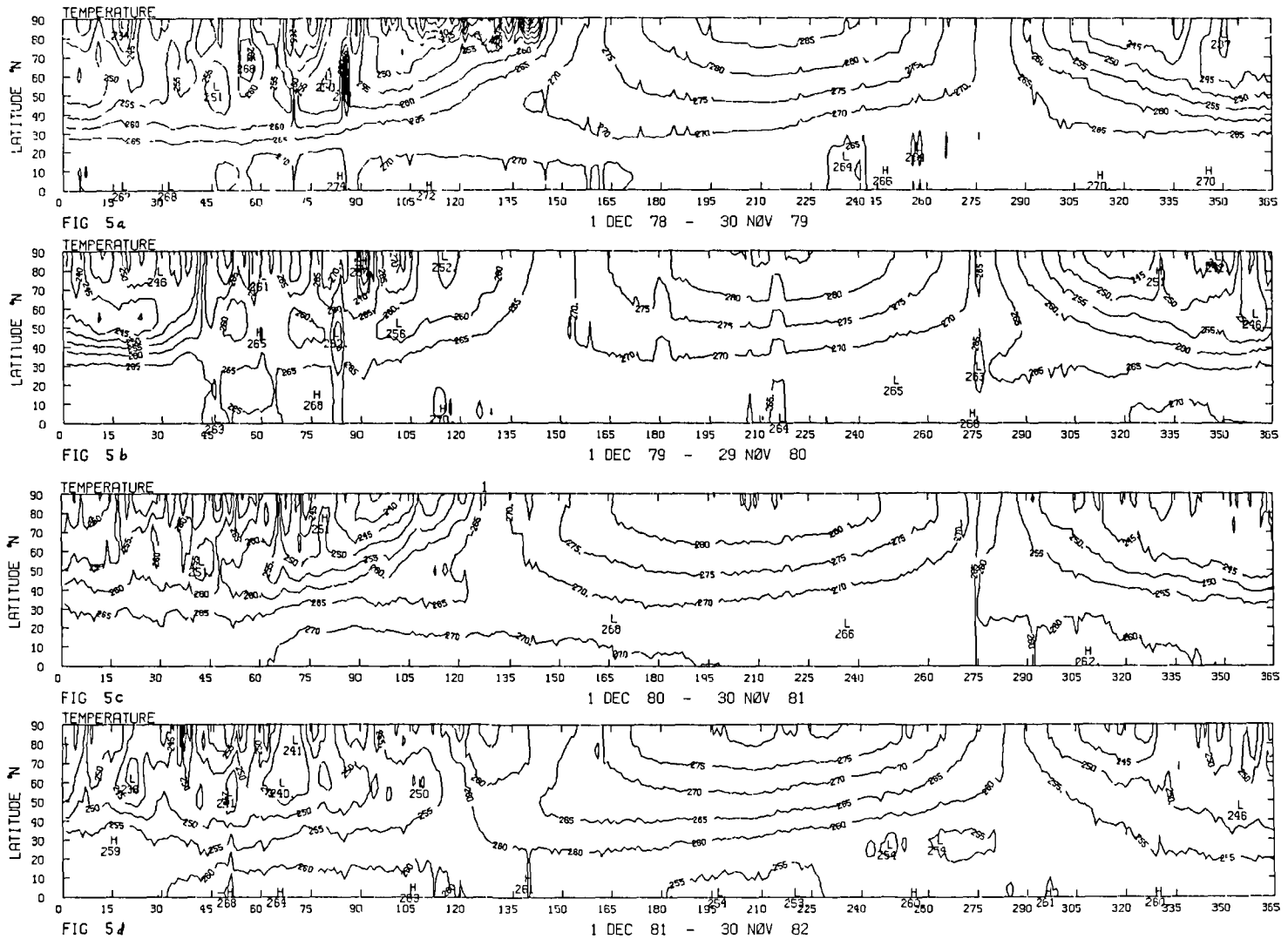


Fig 5. Time-latitude section of the zonally-averaged daily temperature [T] (K) at 1 mb for the period 1 December 1978 through 30 November 1982.

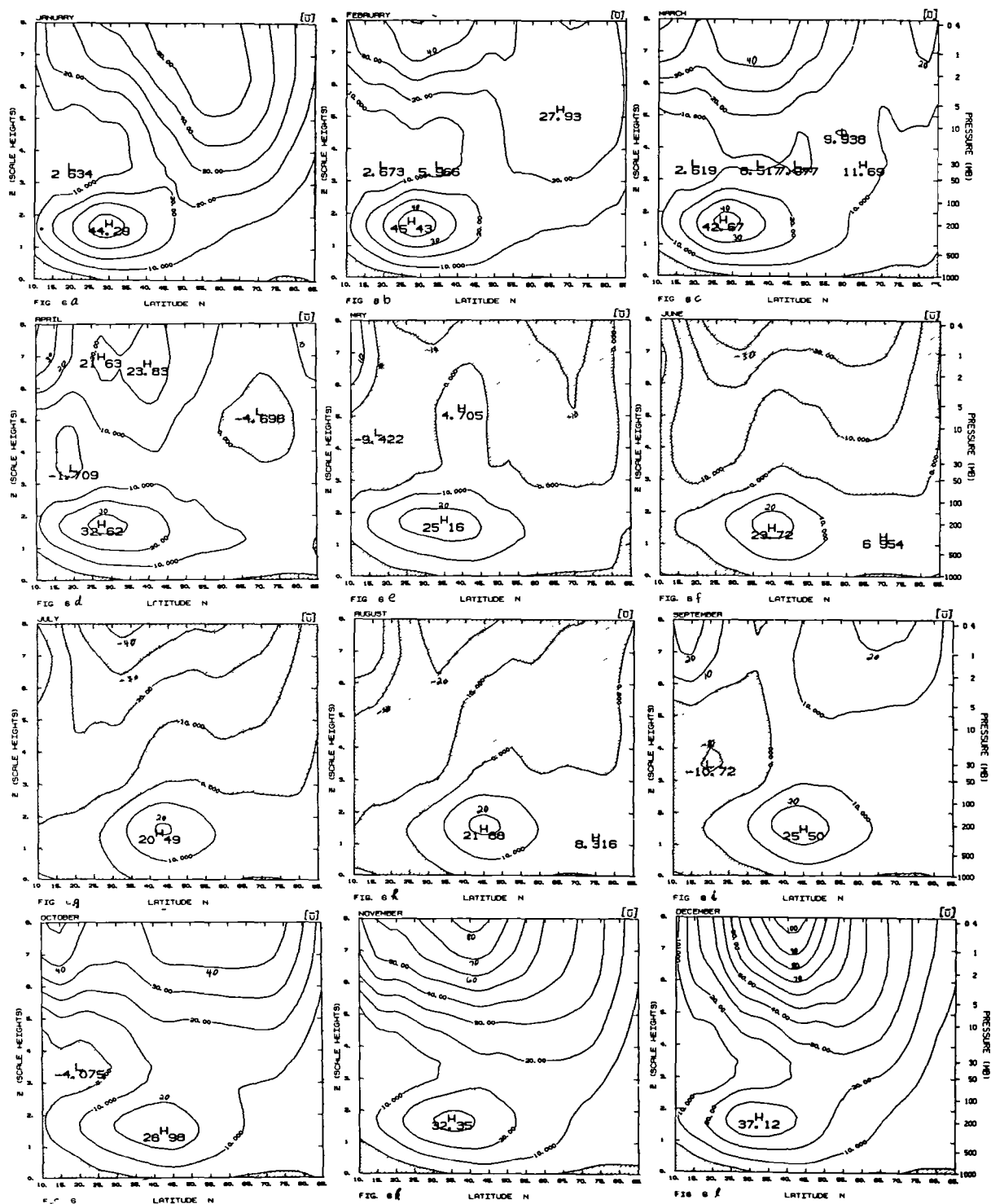


Fig 6. Monthly Northern Hemisphere four year average mean zonal winds $[u]$ (m/sec).

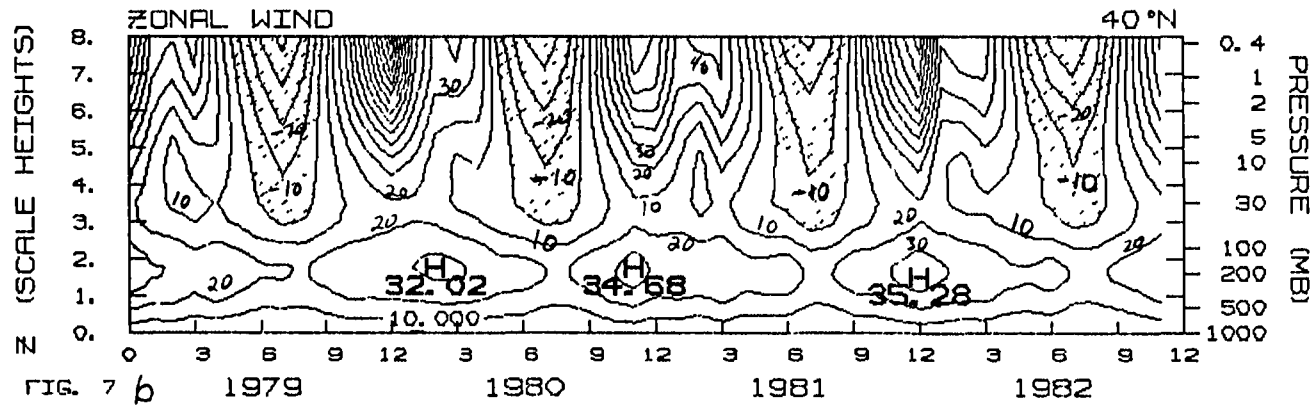
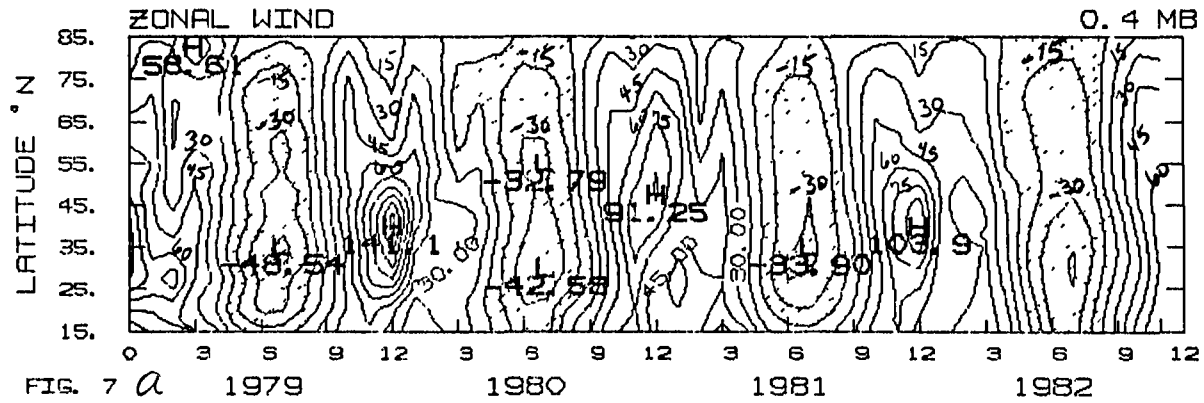


Fig 7. Zonally-averaged monthly mean zonal wind $[\bar{u}]$ (m/sec), (a) time-latitude section at 0.4 mb, (b) time-height section at 40°N.

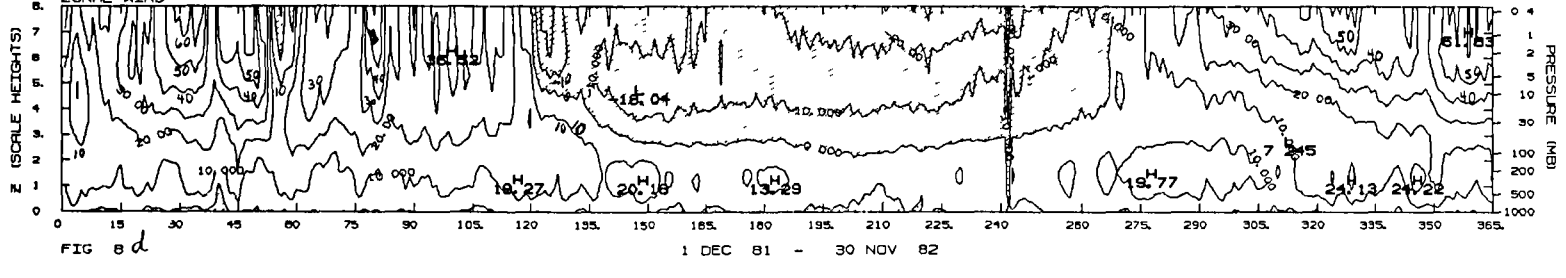
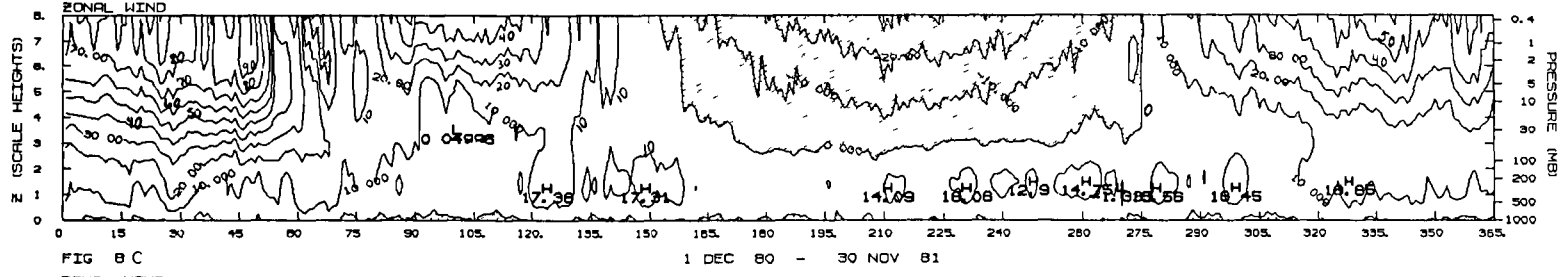
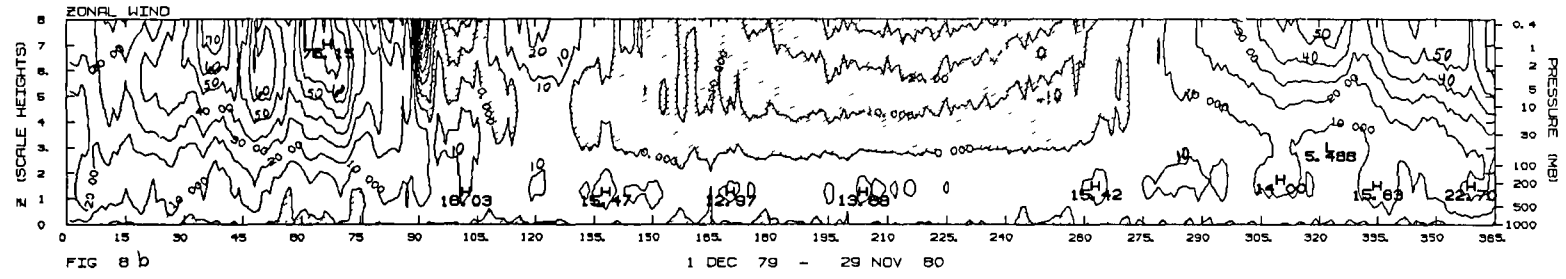
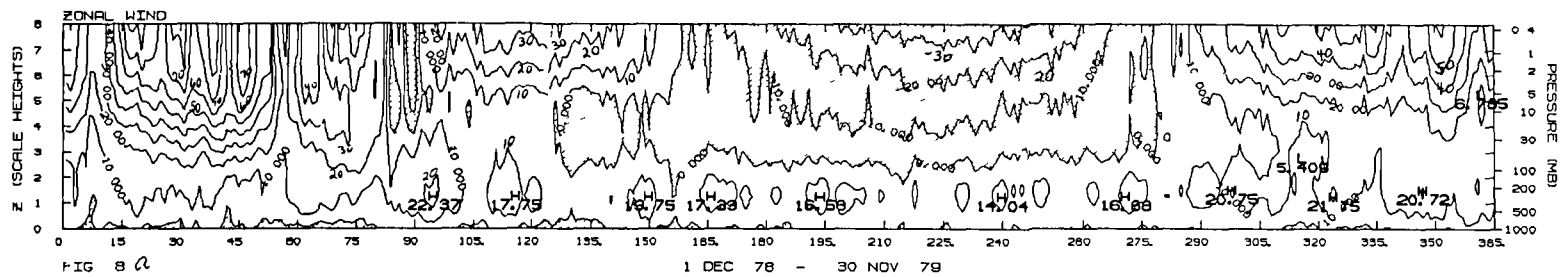


Fig 8. Time-height section of the mean daily zonal winds [u] (m/sec) at 60°N for the period 1 December 1978 through 30 November 1982.

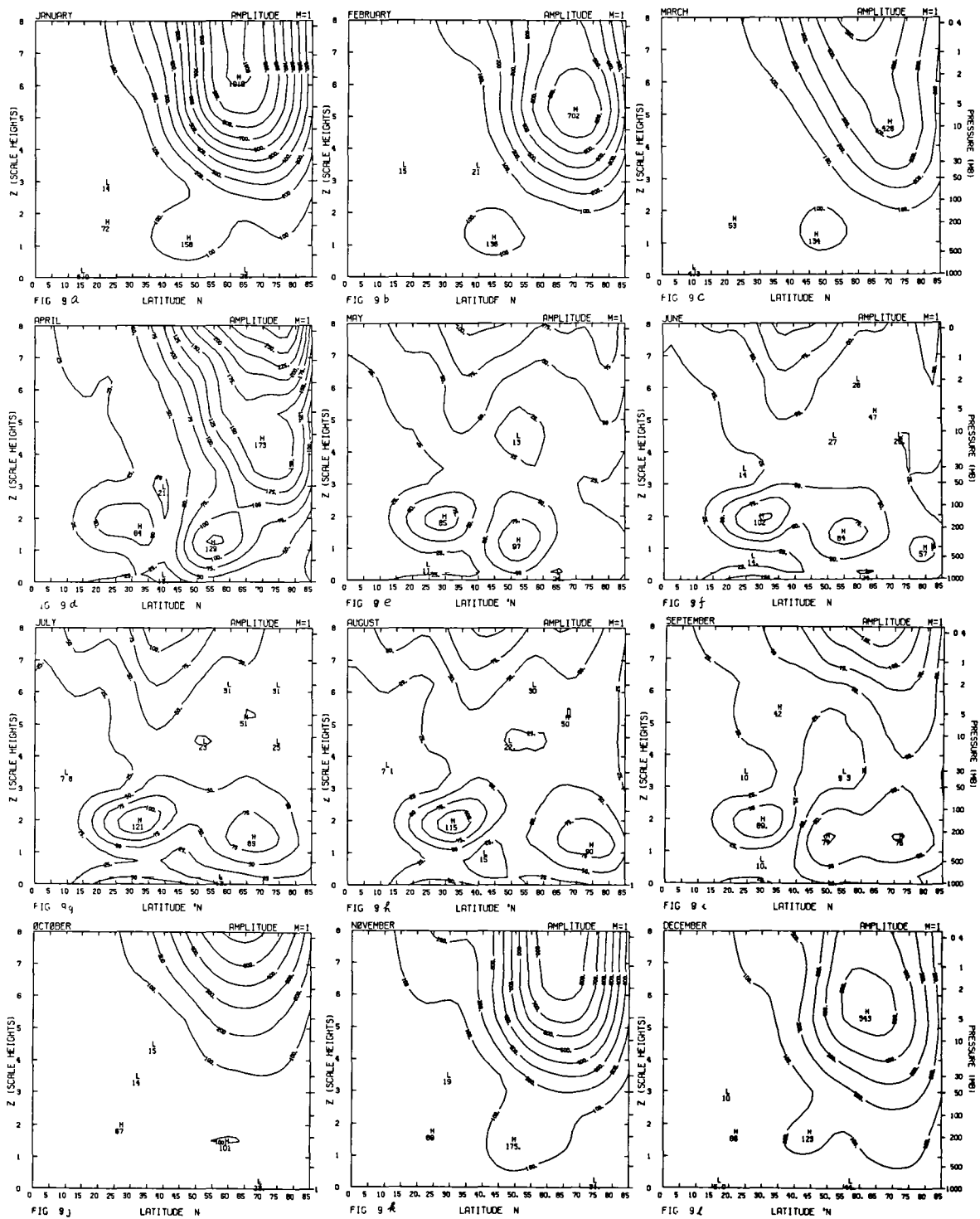


Fig 9. Northern Hemisphere four year mean geopotential height amplitudes (m) of zonal wavenumber one for the months.

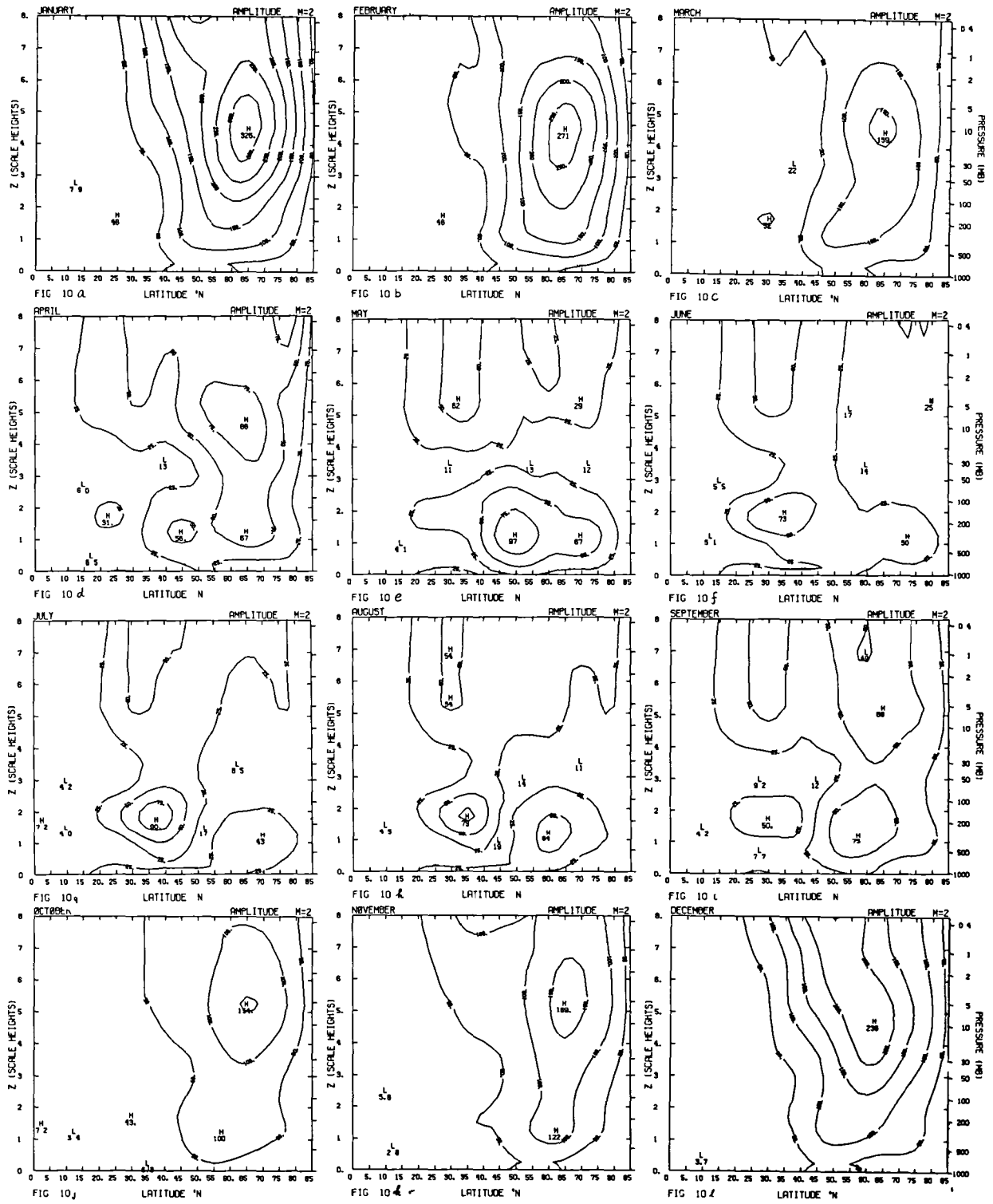


Fig 10. As in Figure 9, but for wavenumber two.

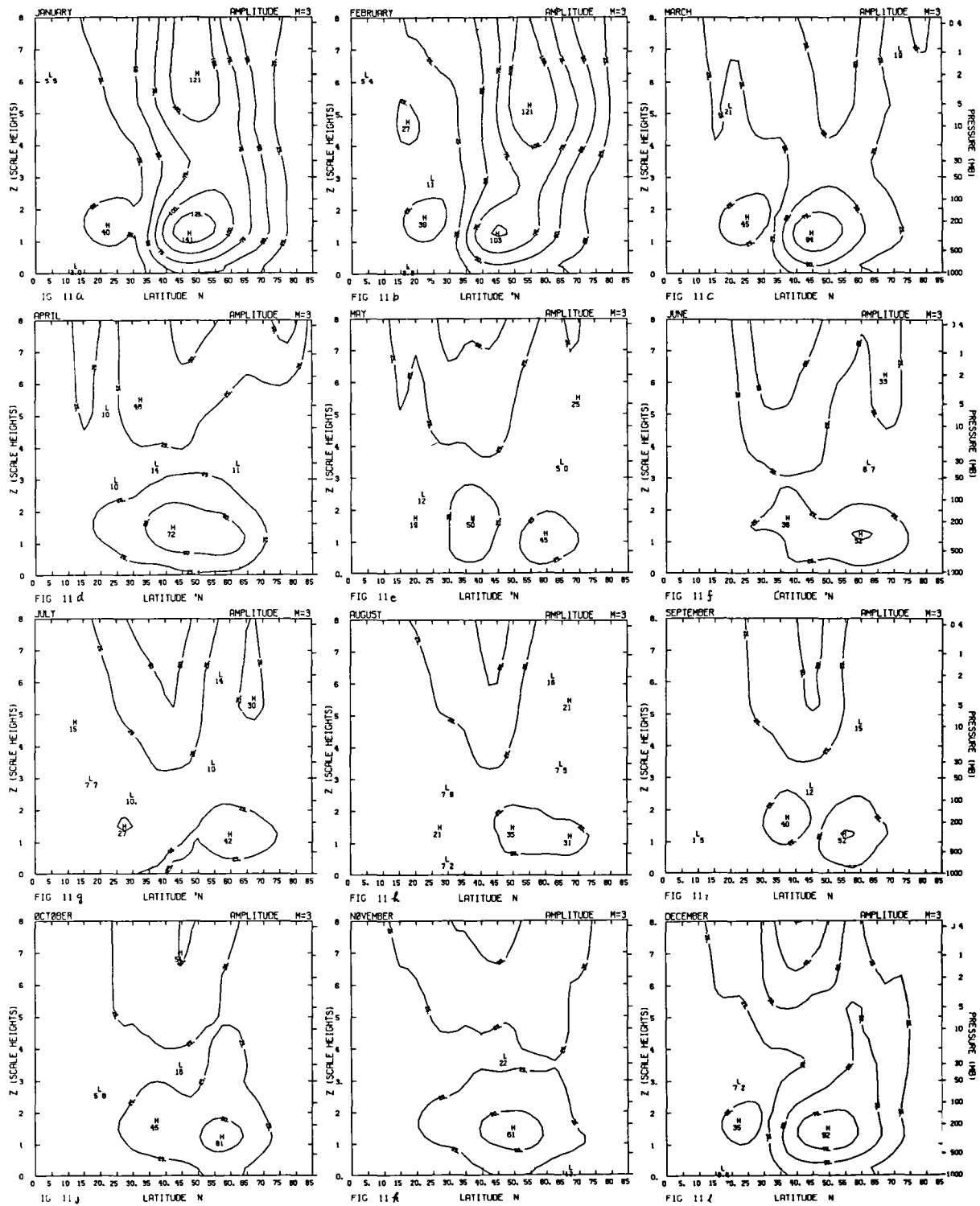


Fig 11. As in Figure 9, but for wavenumber three.



Fig 12. Northern Hemisphere four-year mean geopotential height phases of zonal wavenumber one for the months.

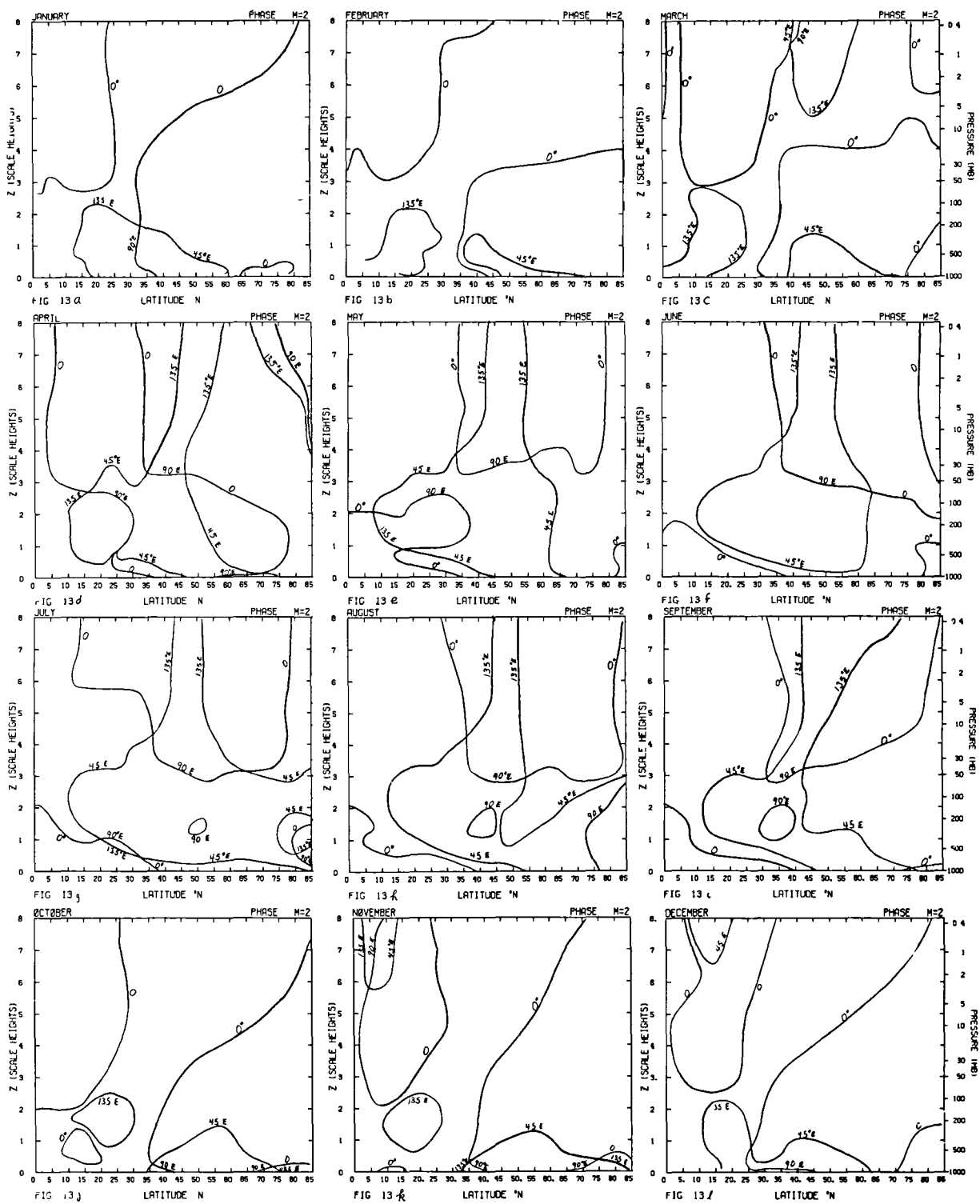


Fig 13. As in Figure 12, but for wavenumber two.

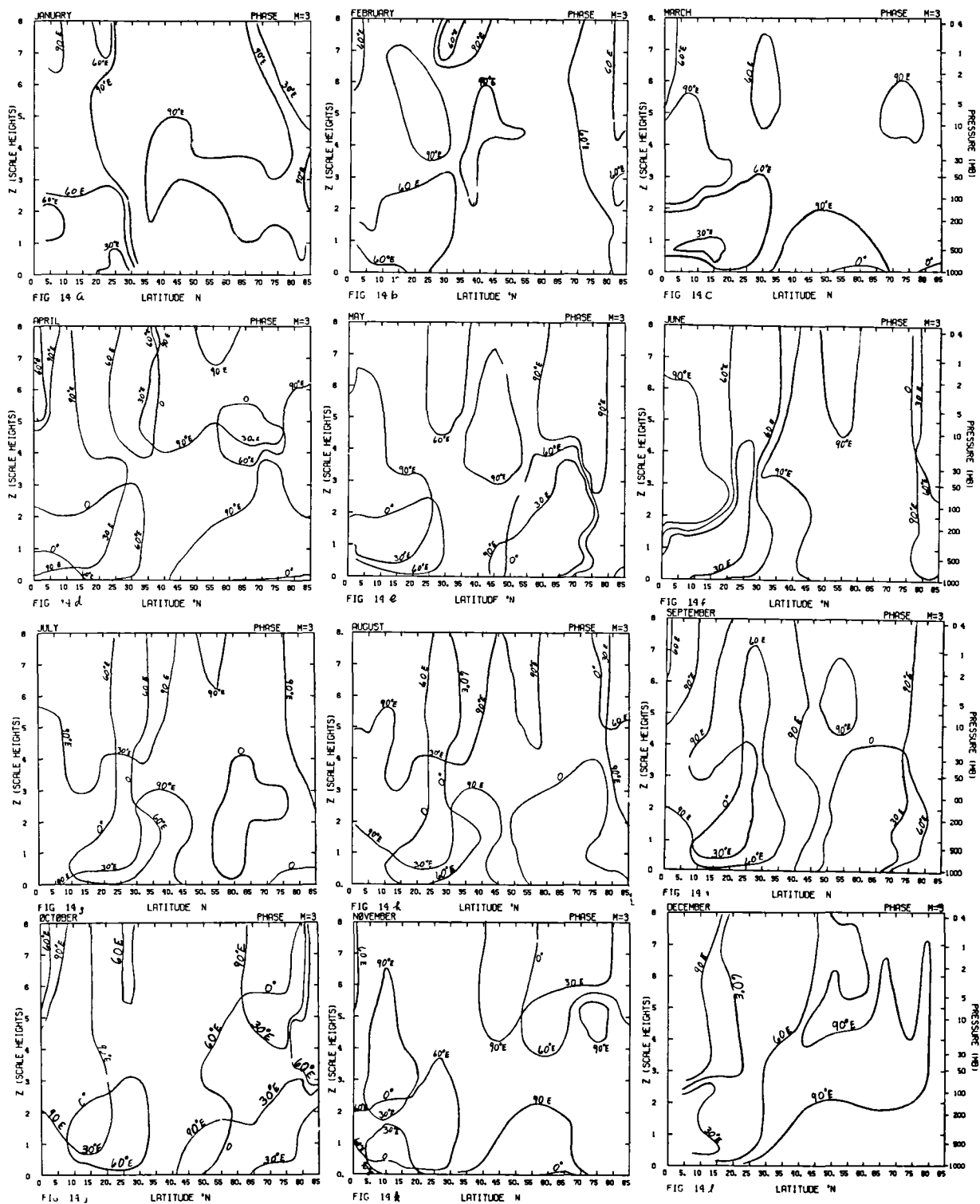


Fig 14. As in Figure 12, but for wavenumber three.

Fig 14. As in Figure 12, but for wavenumber three.

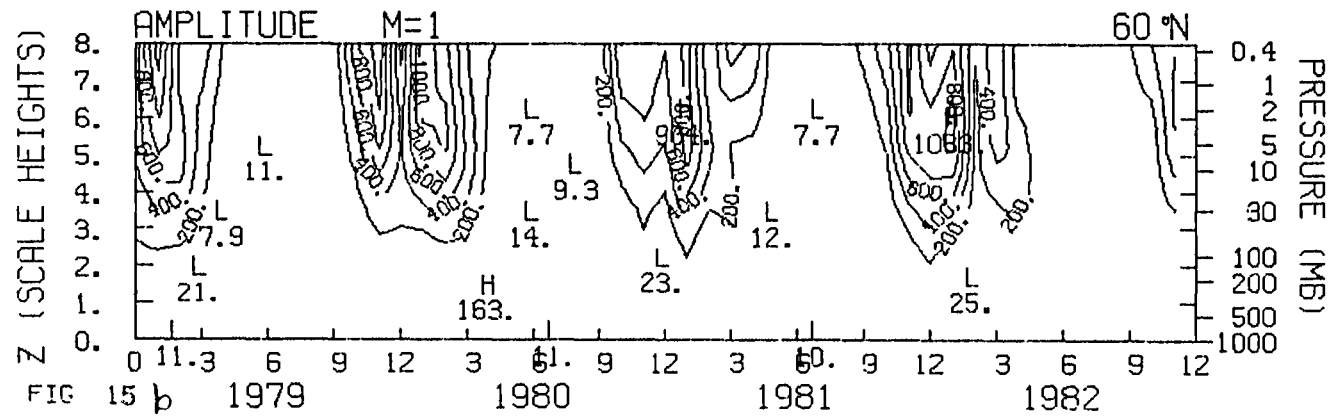
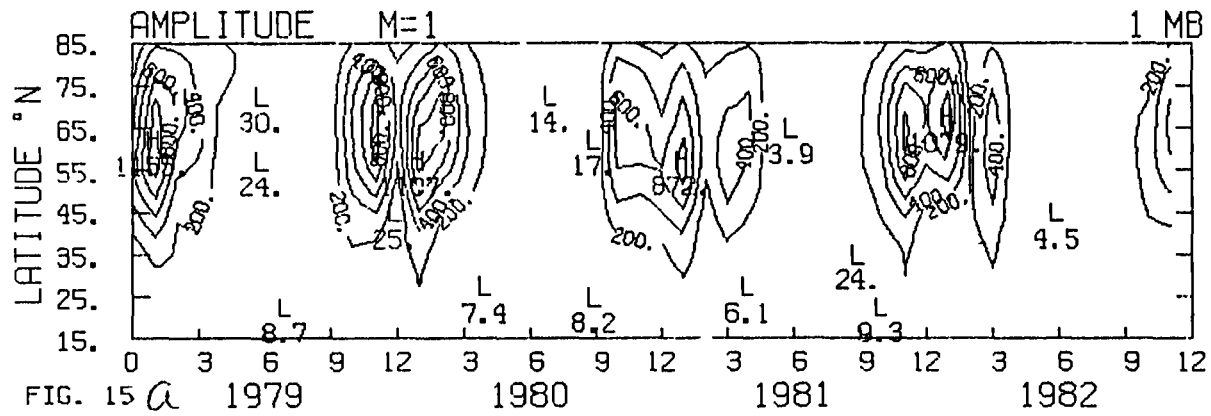


Fig 15. Monthly mean geopotential height amplitude (m) of zonal wavenumber one, (a) time-latitude section at 1 mb, (b) time-height section at 60°N.

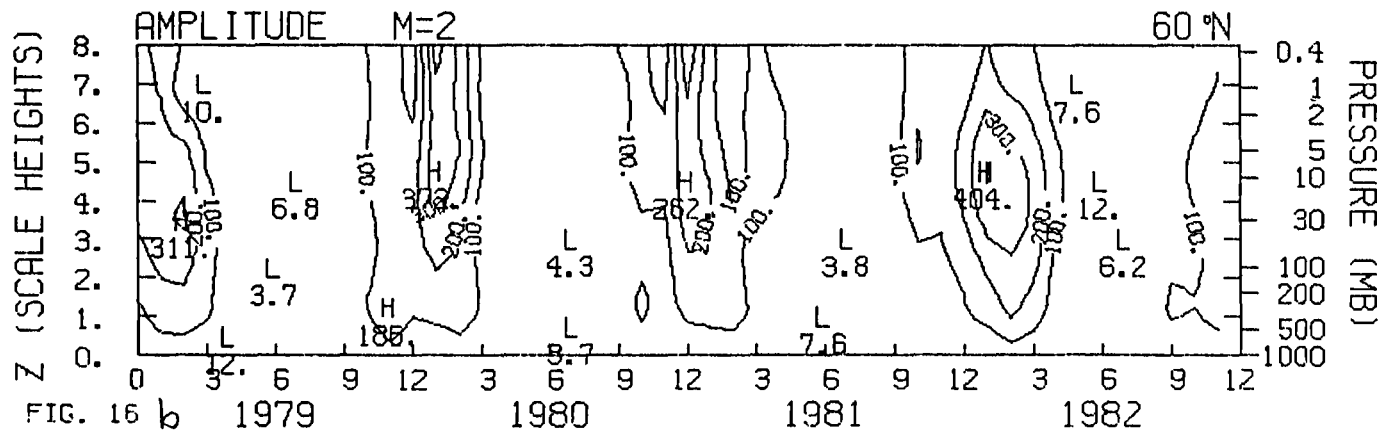
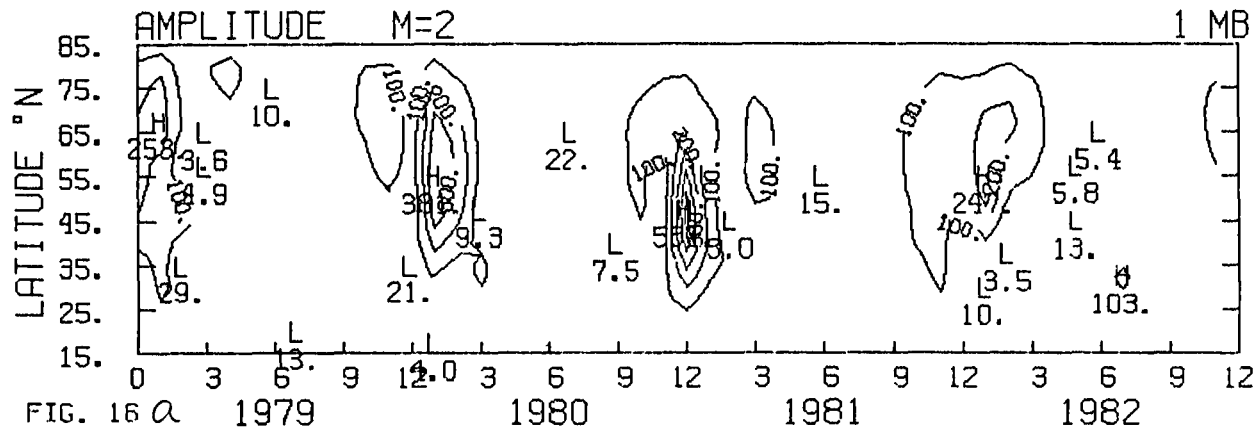


Fig 16. As in Fig. 15, but for wavenumber two.

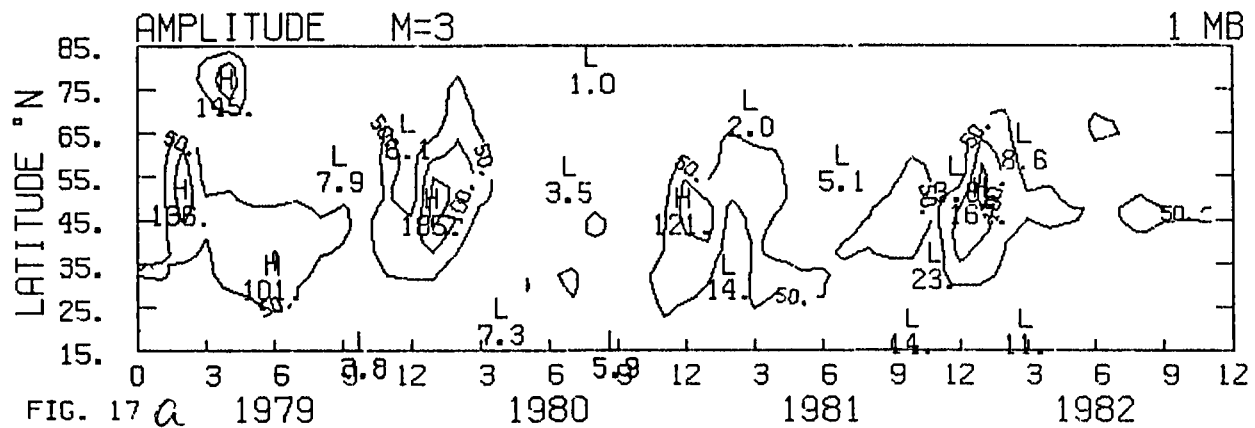


FIG. 17 a 1979 1980 1981 1982

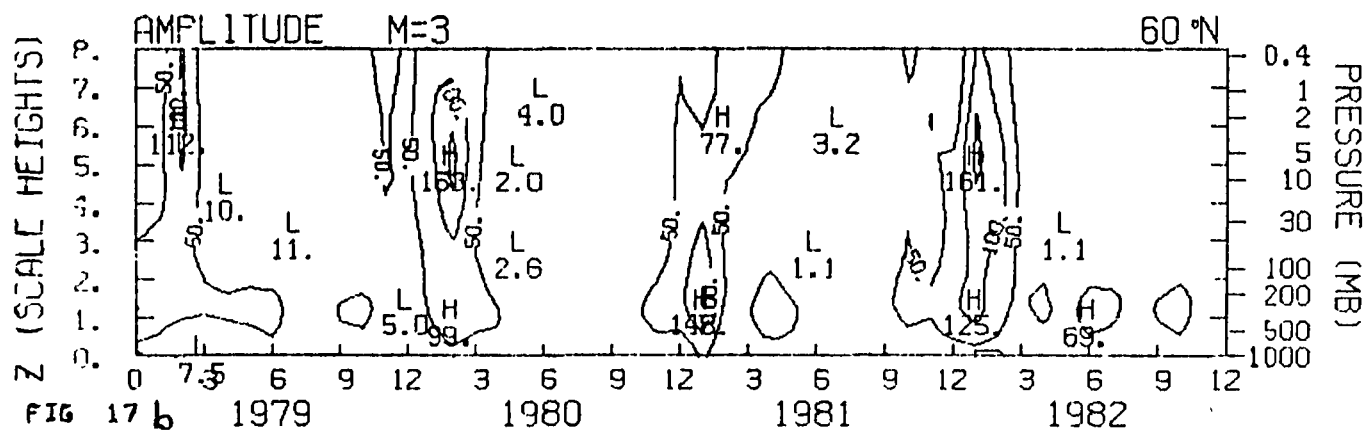


FIG 17 b 1979 1980 1981 1982

Fig 17. As in Fig. 15, but for wavenumber three.

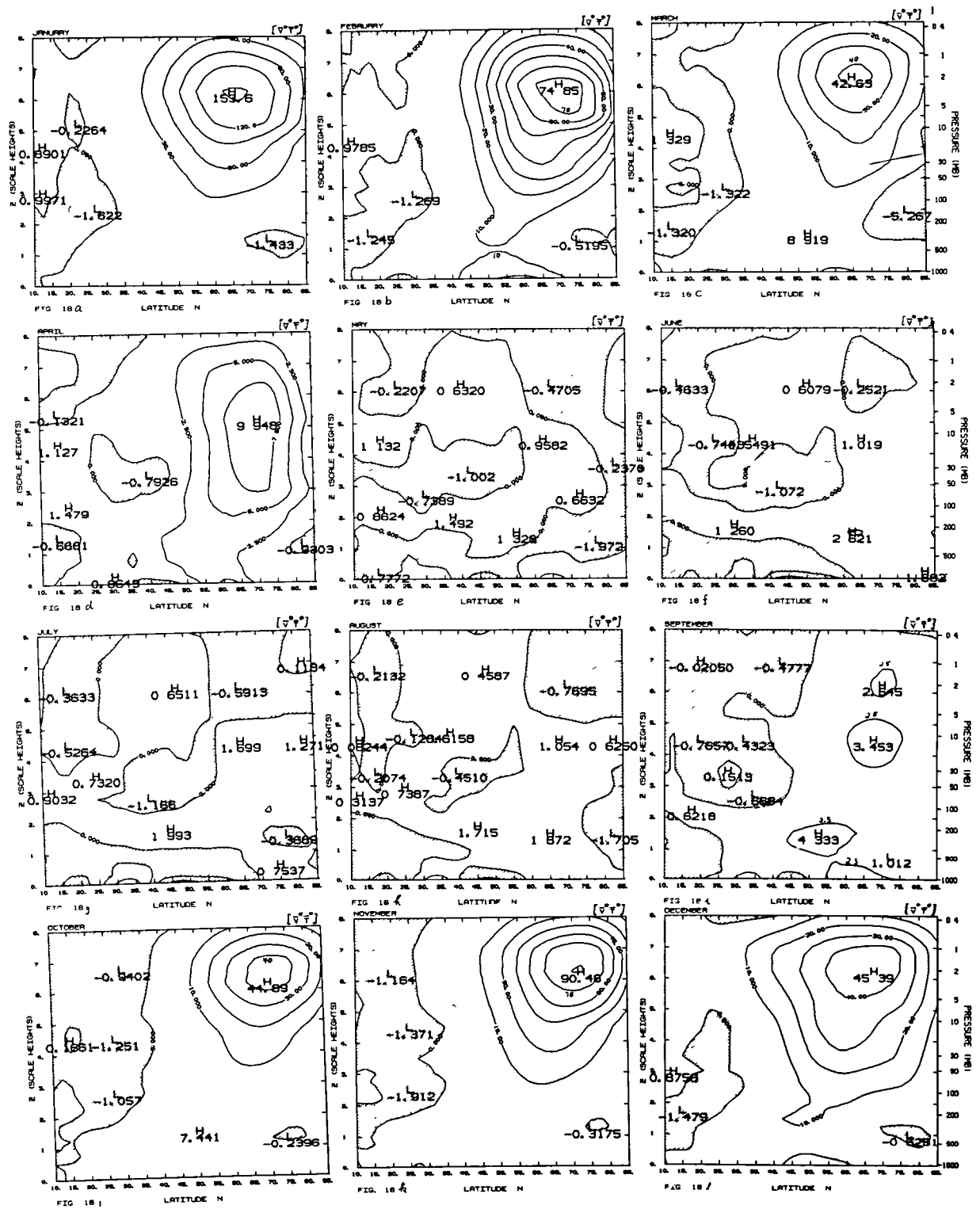


Fig 18. Monthly Northern Hemisphere four year mean northward flux of sensible heat by the standing eddies, $[\overline{v^*T^*}]$ (K m/sec).

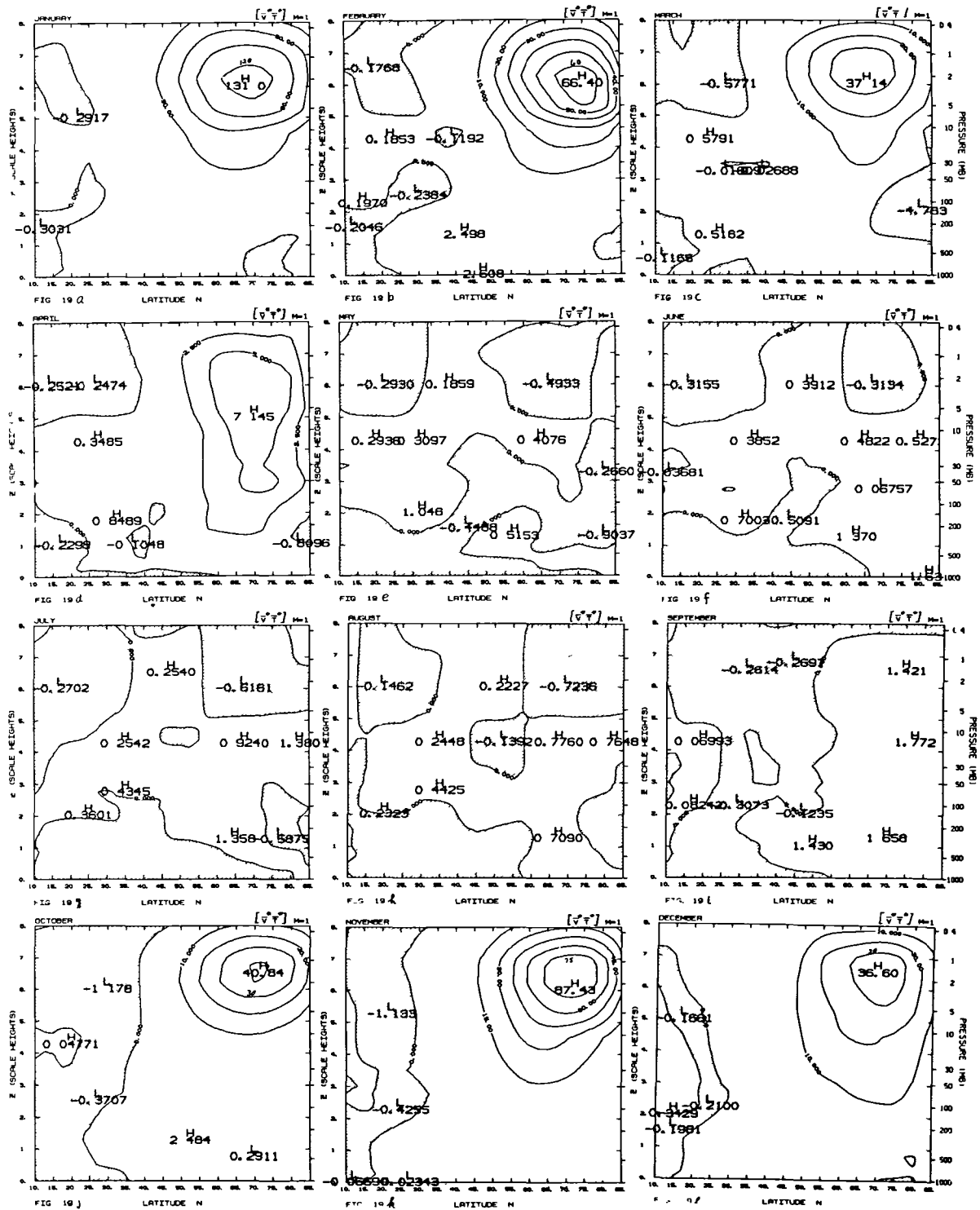


Fig 19. Northward flux of heat by the stationary eddy zonal wave-number one $[\bar{v}^*T^*]_{m=1}$ (K m/sec).

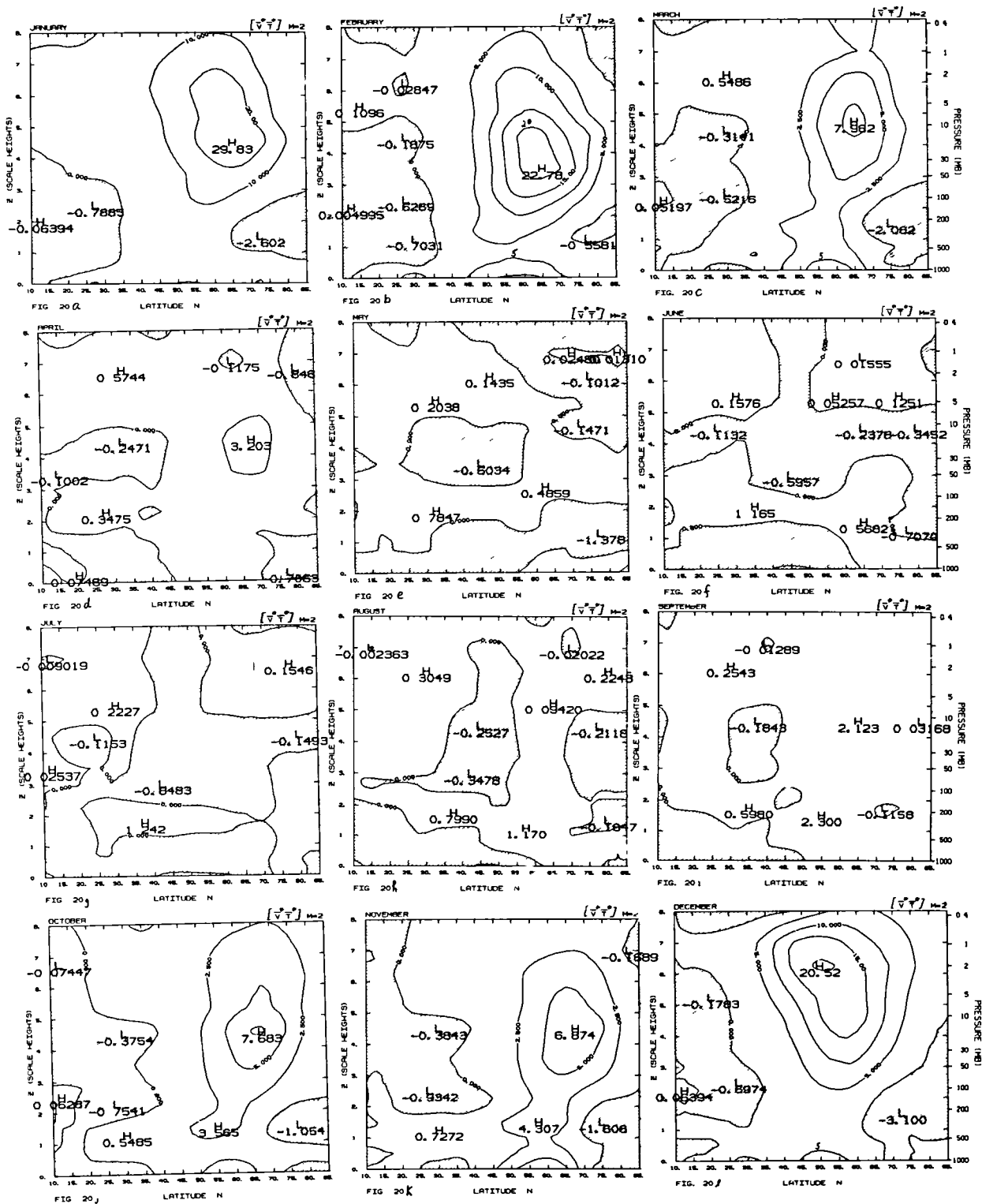


Fig 20. As in Figure 19, but for wavenumber two.

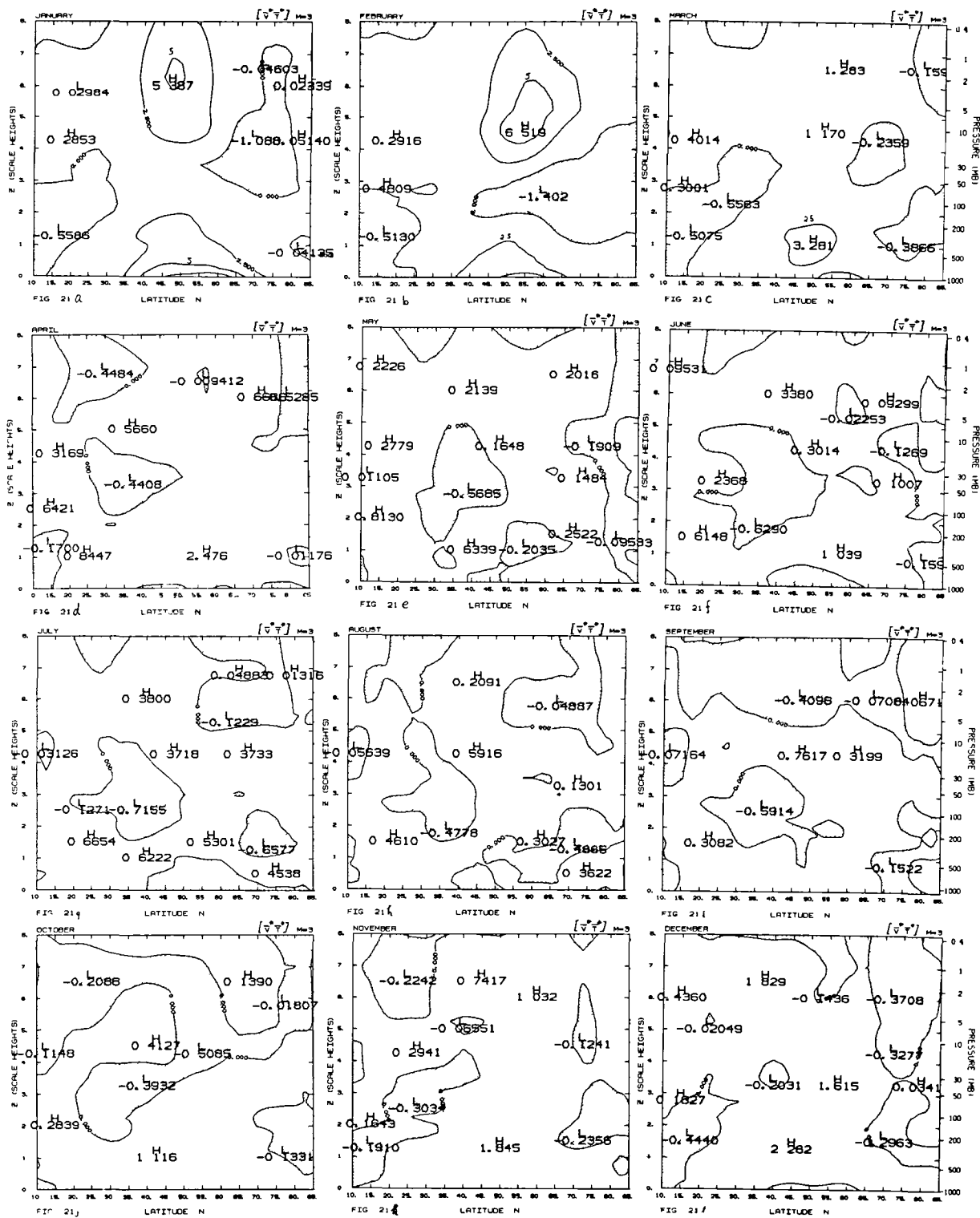


Fig 21. As in Figure 19, but for wavenumber three.

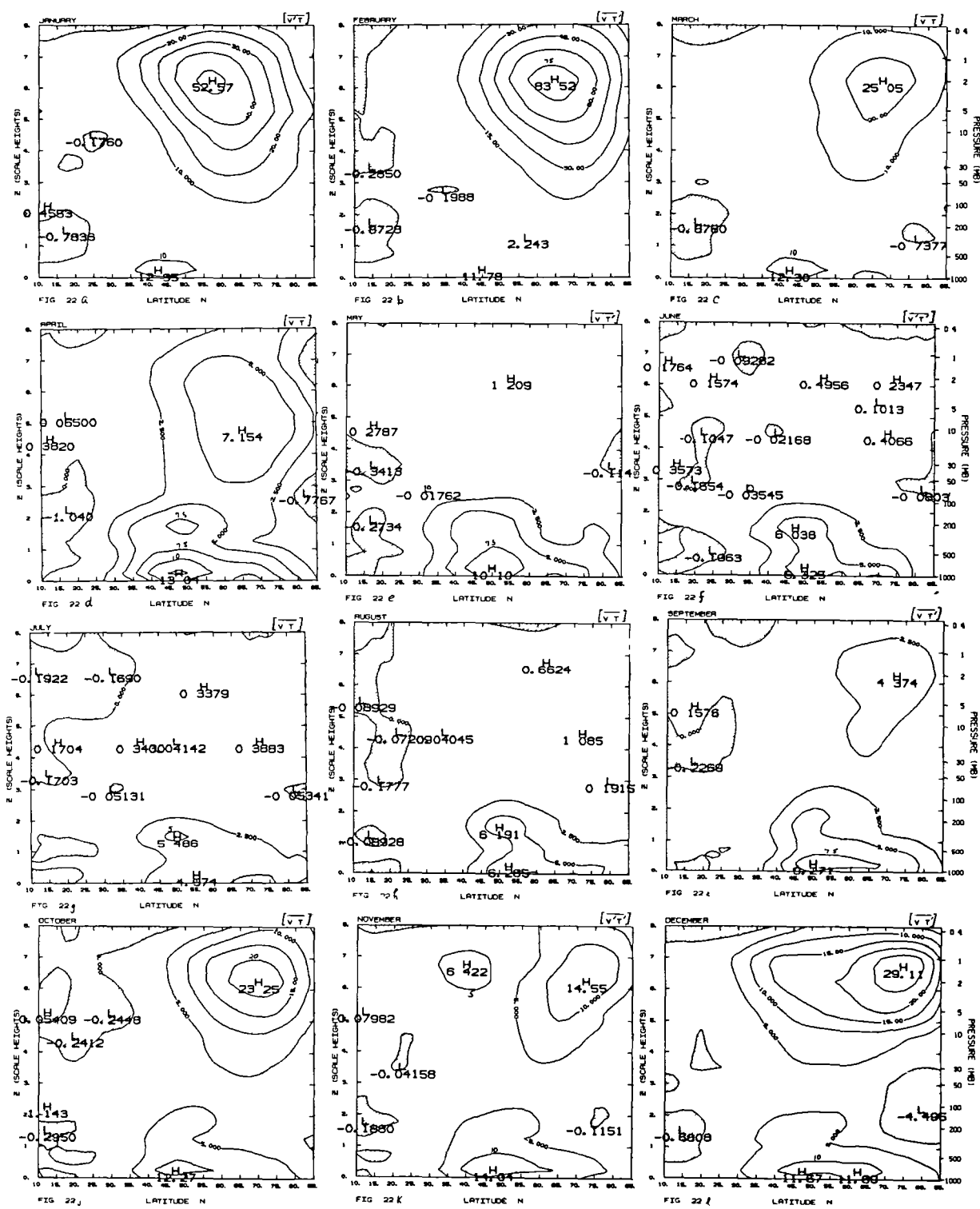


Fig 22. As in Figure 18, but for the northward flux of heat by transient eddies, $[v'T']$ (K m/sec).

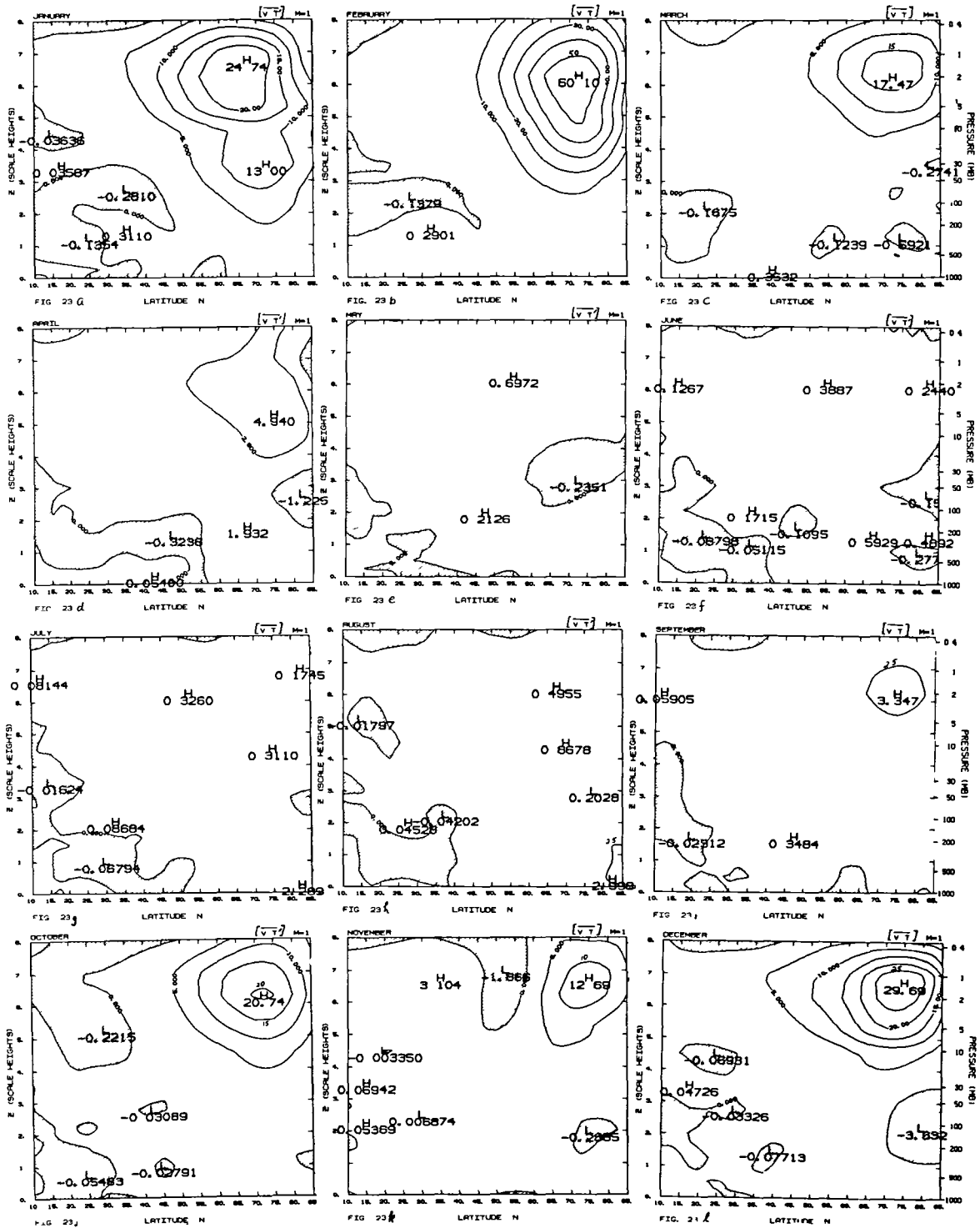


Fig 23. Northward flux of heat by the transient eddy zonal wavenumber one $[\overline{v'T'}]_{m=1}$ (K m/sec).

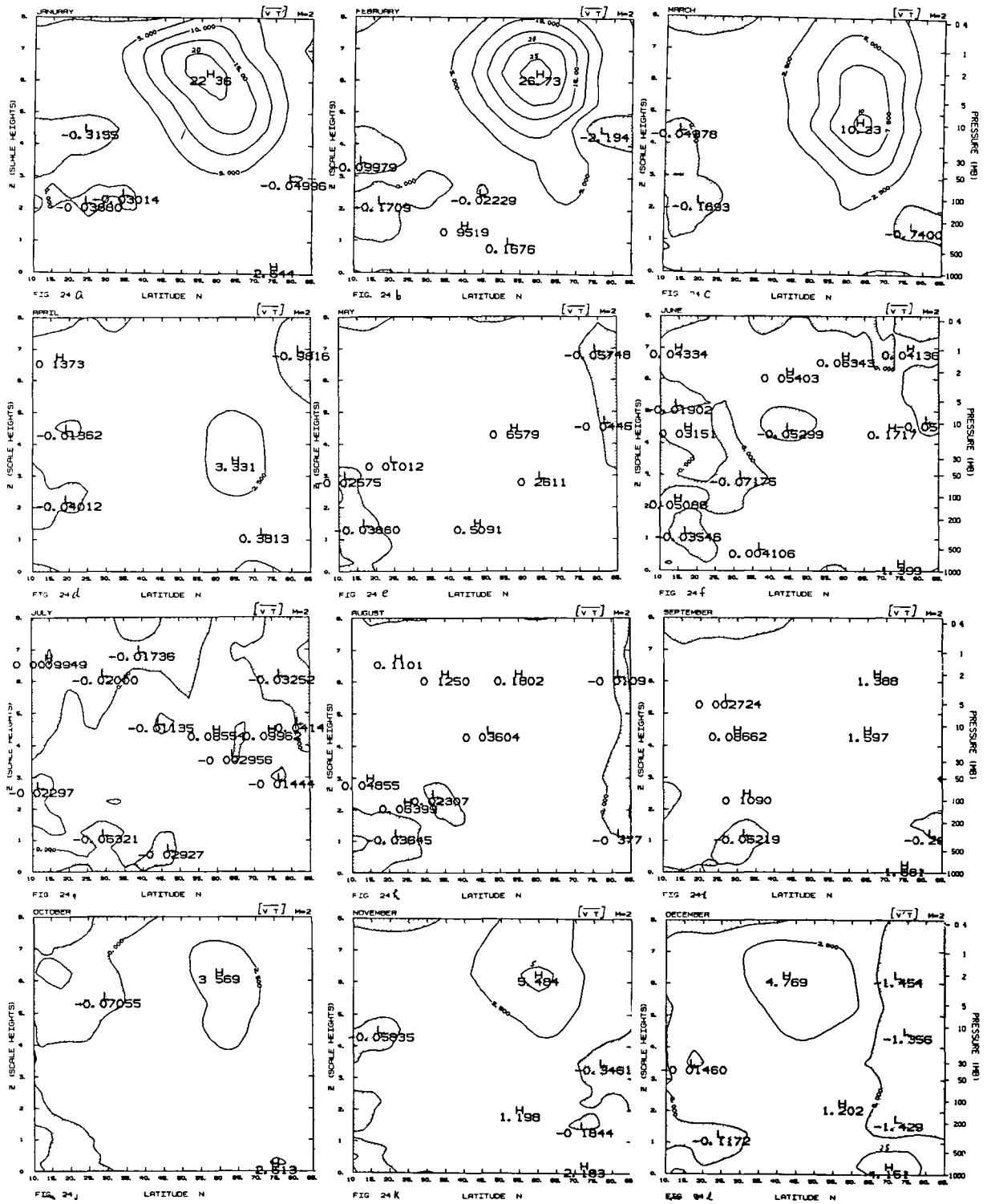


Fig 24. As in Figure 23, but for wavenumber two.

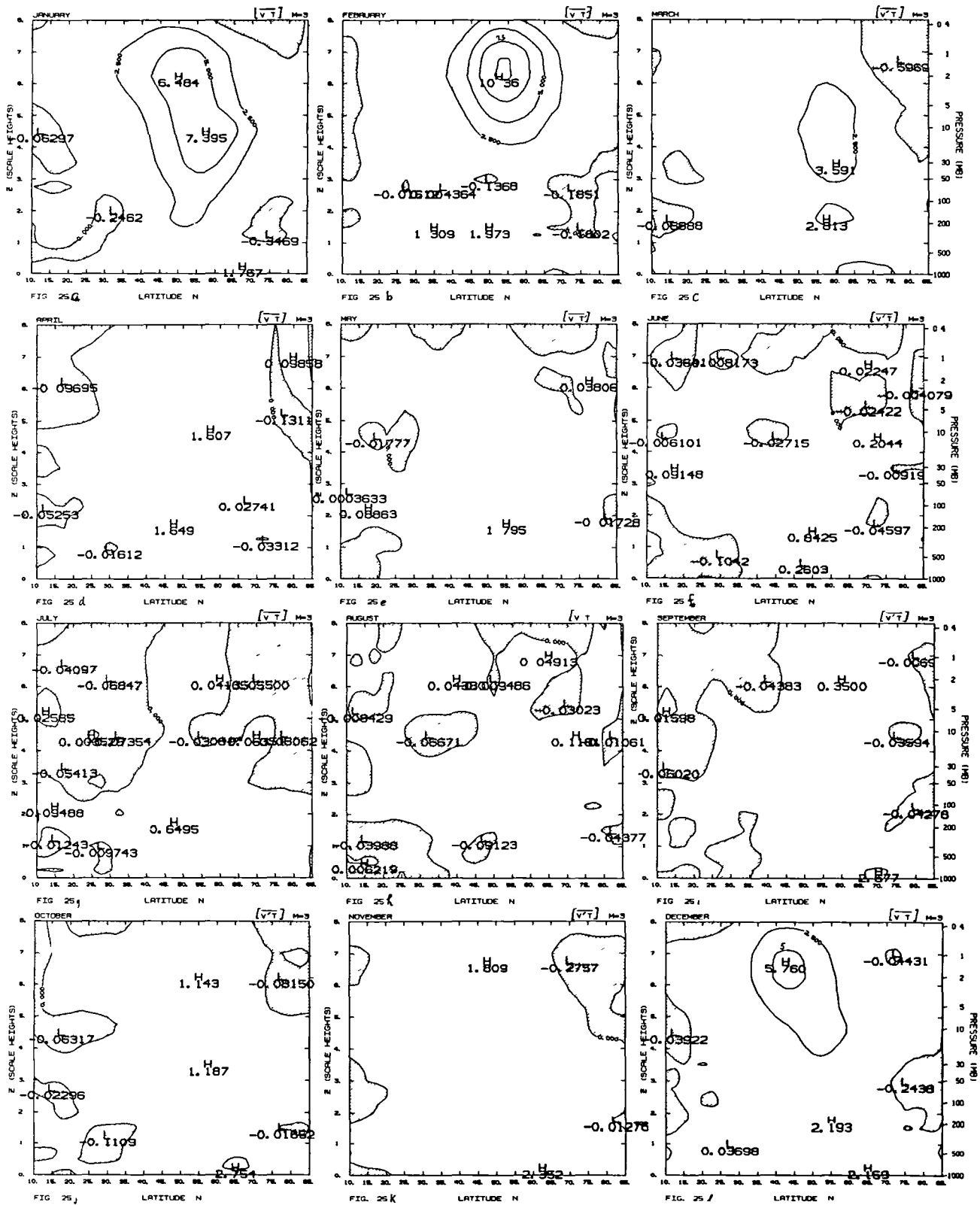


Fig 25. As in Figure 23, but for wavenumber three.

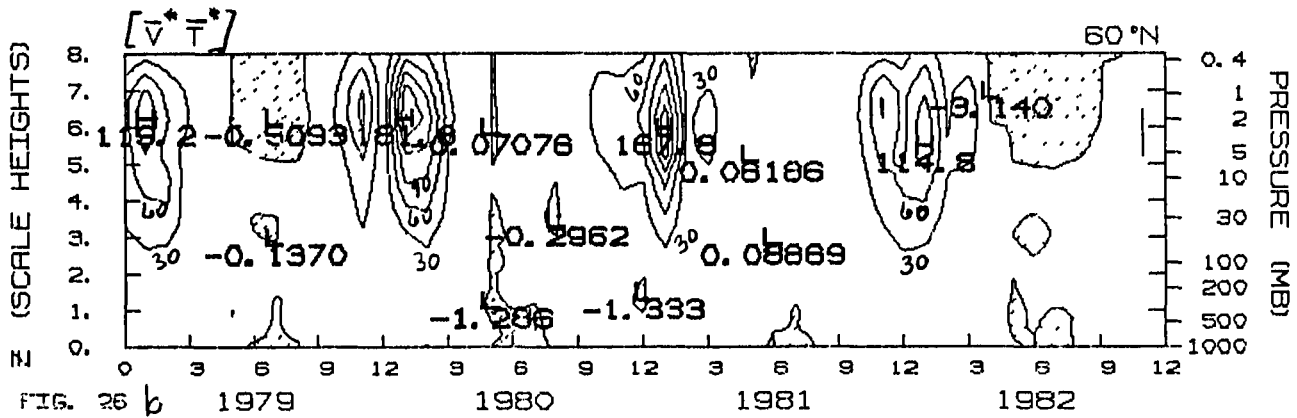
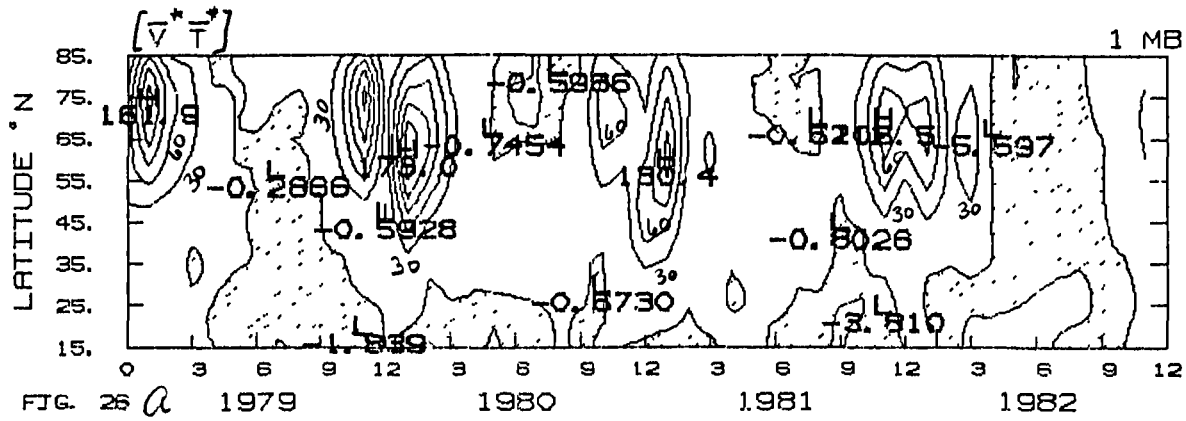


Fig 26. Northward flux of sensible heat by the standing eddies, $[\bar{v}^* \bar{T}^*]$ (K m/sec), (a) time-latitude section at 1 mb, (b) time-height section at 60°N.

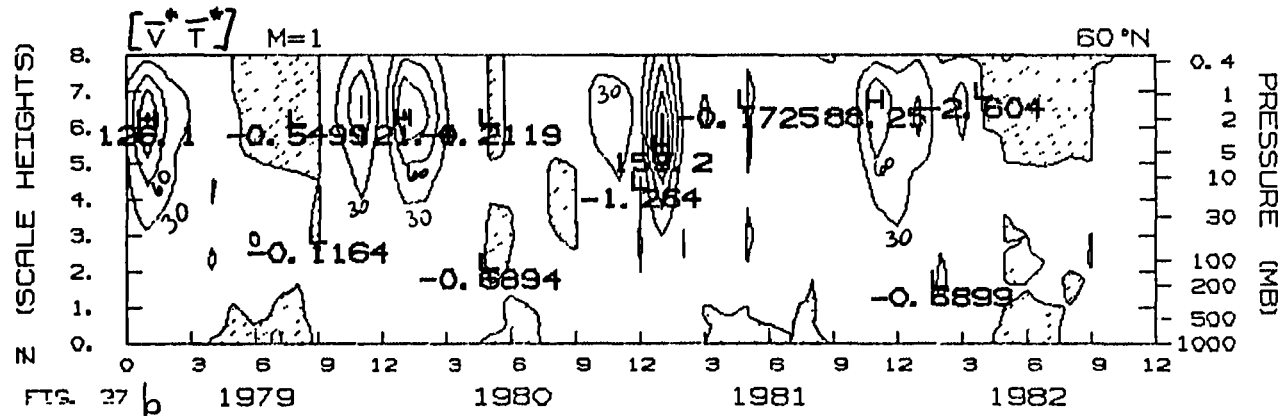
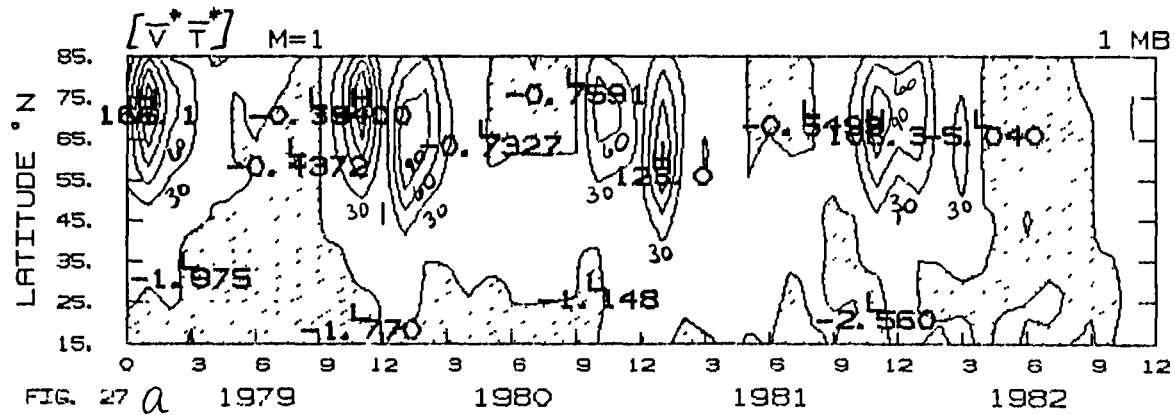


Fig 27. Northward flux of heat by the stationary eddy zonal wave-number one $[\bar{v}^* \bar{T}^*]_{m=1}$ (K m/sec), (a) time-latitude section at 1 mb, (b) time-height section at 60°N.

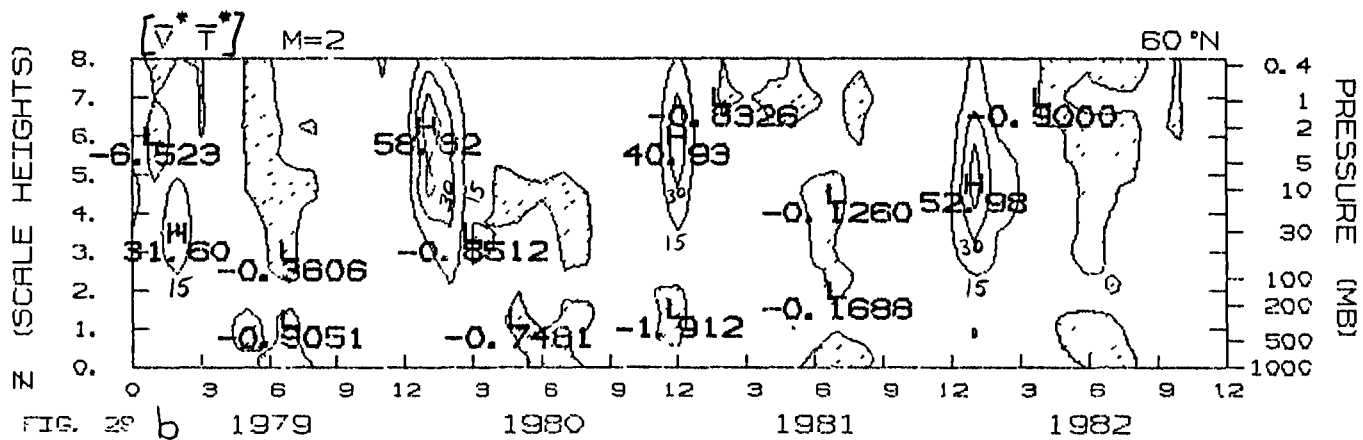
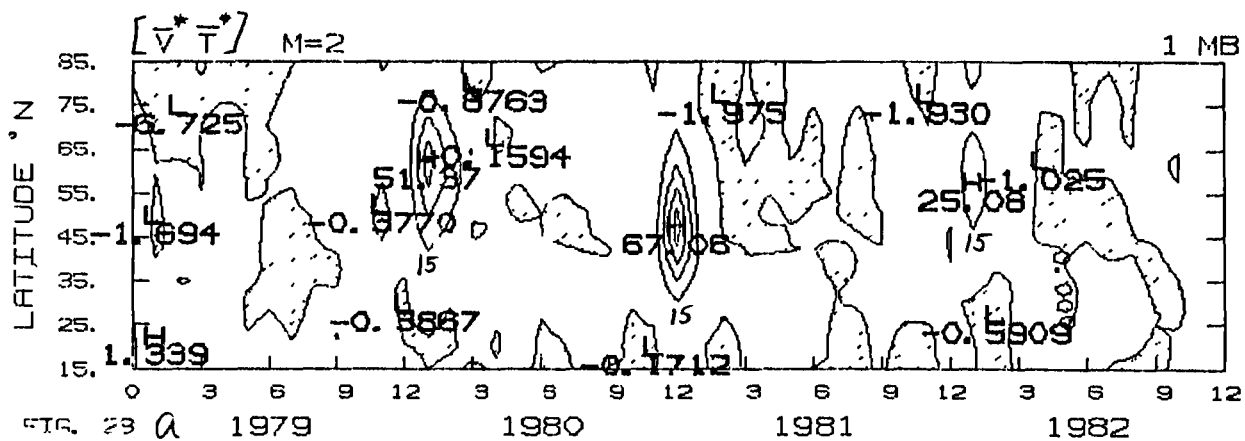


Fig 28. As in Fig. 27, but for wavenumber two.

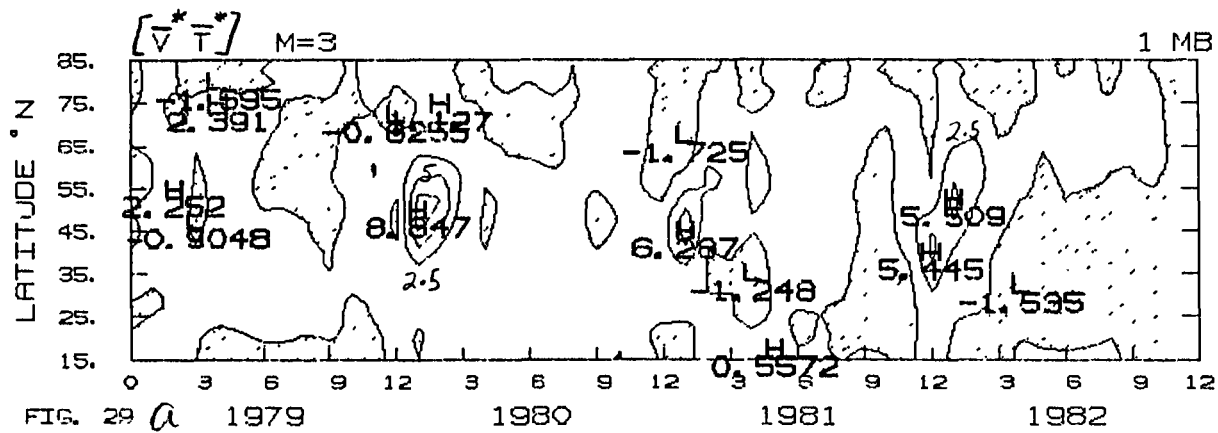


FIG. 29 a 1979 1980 1981 1982

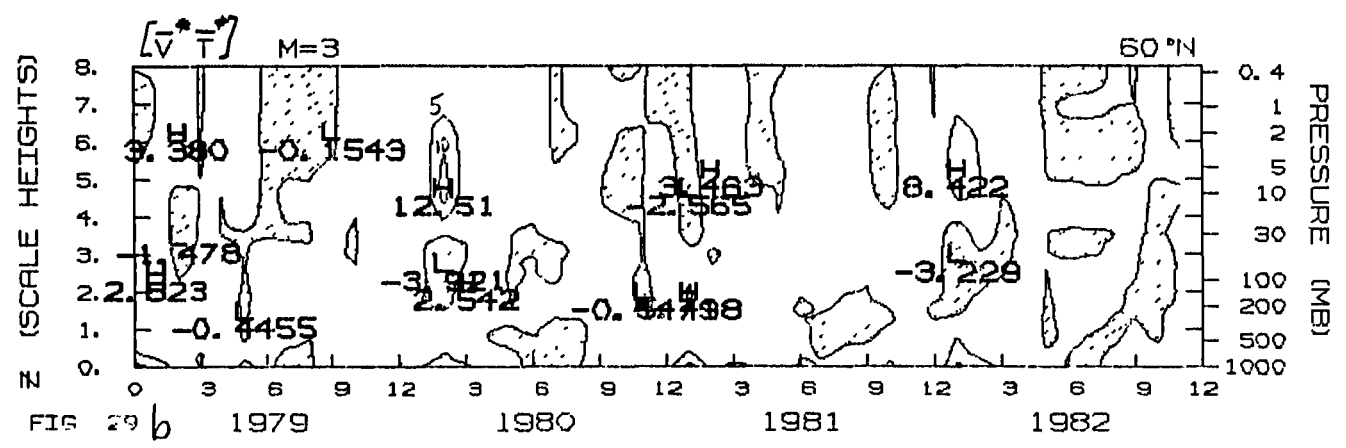


FIG. 29 b 1979 1980 1981 1982

Fig 29. As in Fig. 27, but for wavenumber three.

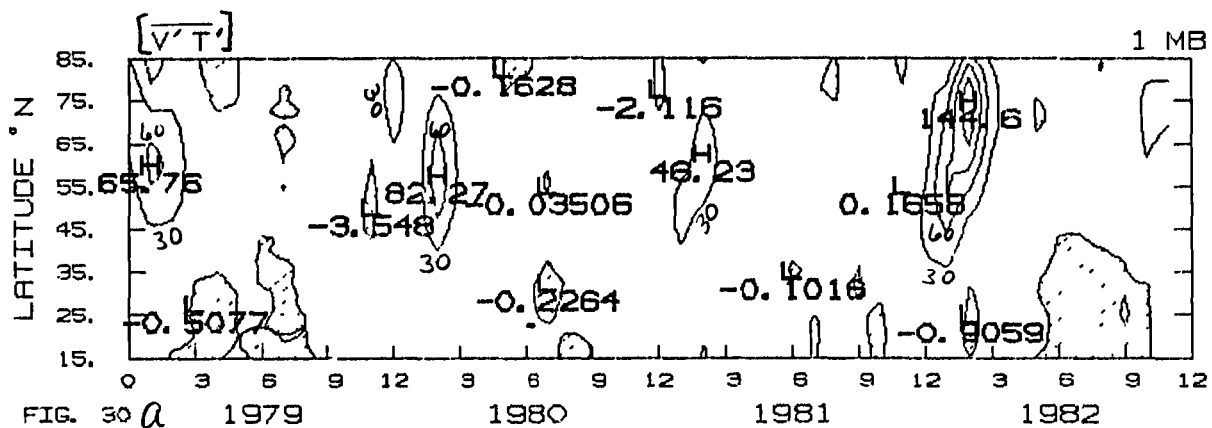


FIG. 30 a 1979 1980 1981 1982

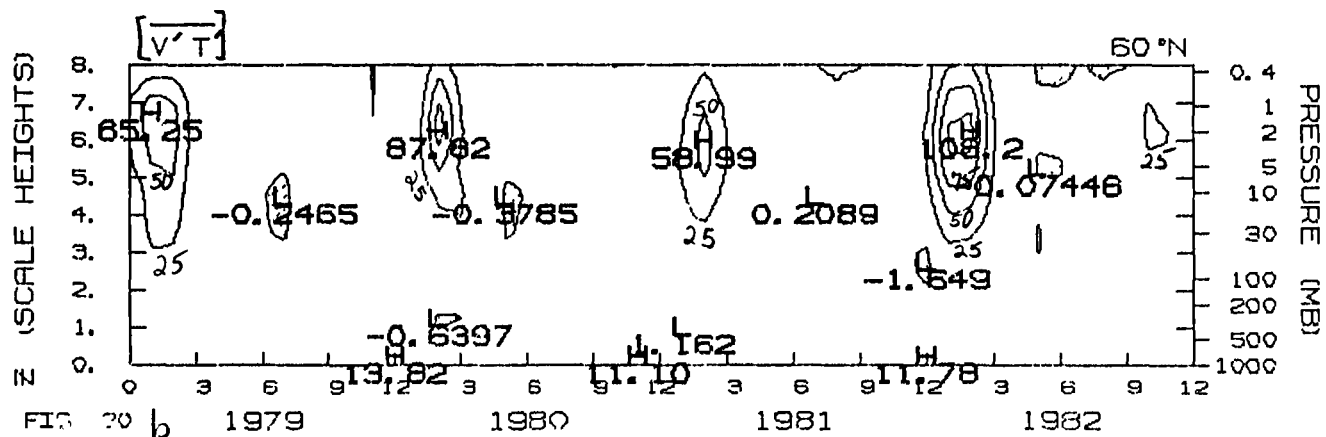


FIG. 30 b 1979 1980 1981 1982

Fig 30. As in Fig. 26, but for the northward flux of heat by transient eddies, $[v'T']$ (K m/sec).

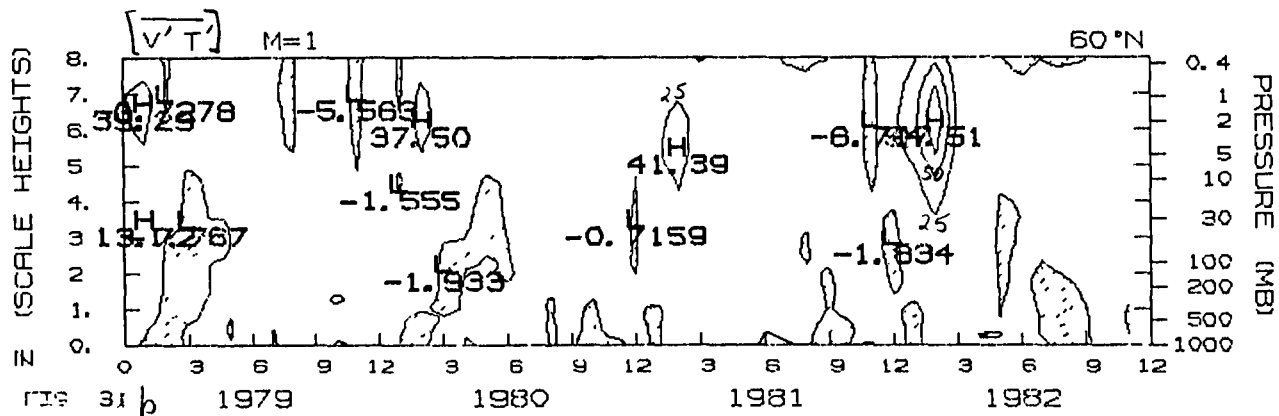
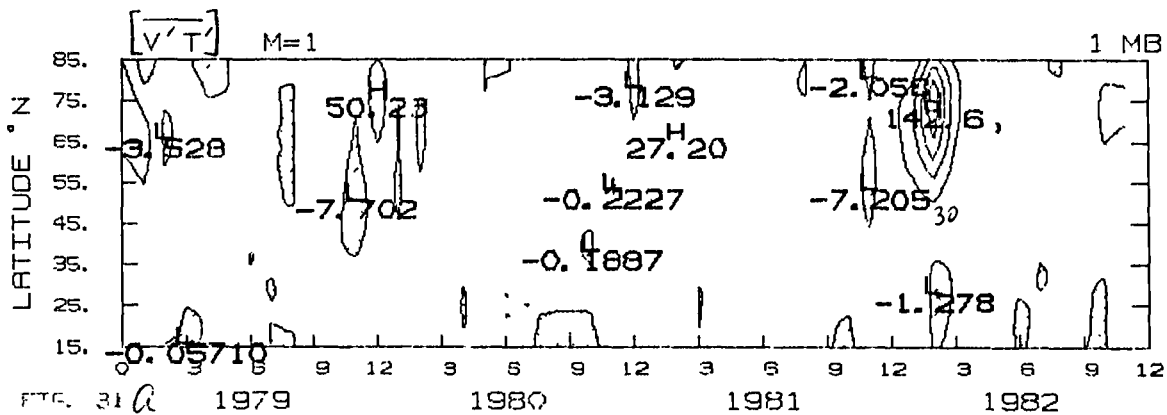


Fig 31. Northward flux of heat by the transient eddy zonal wave-number one $[\overline{v'T'}]_{M=1}$ (k m/sec), (a) time-latitude section at 1 mb, (b) time-height section at 60°N.

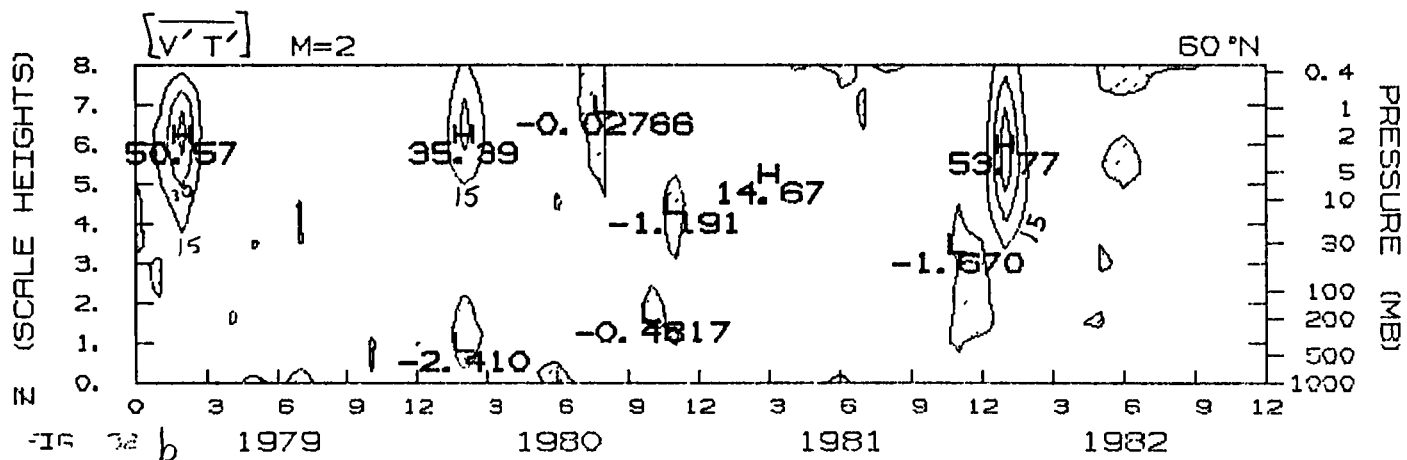
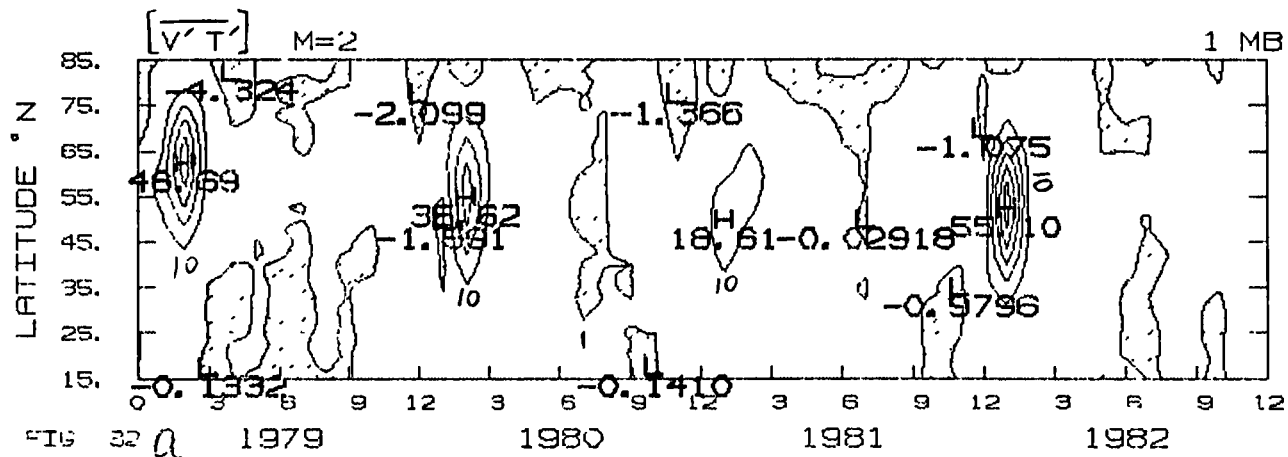


Fig 32. As in Fig. 31, but for wavenumber two.

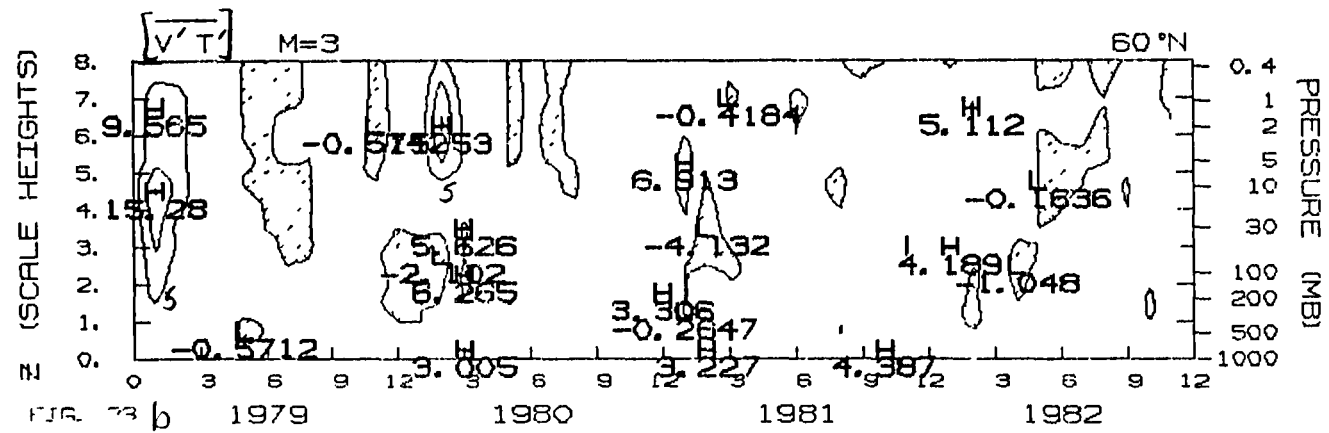
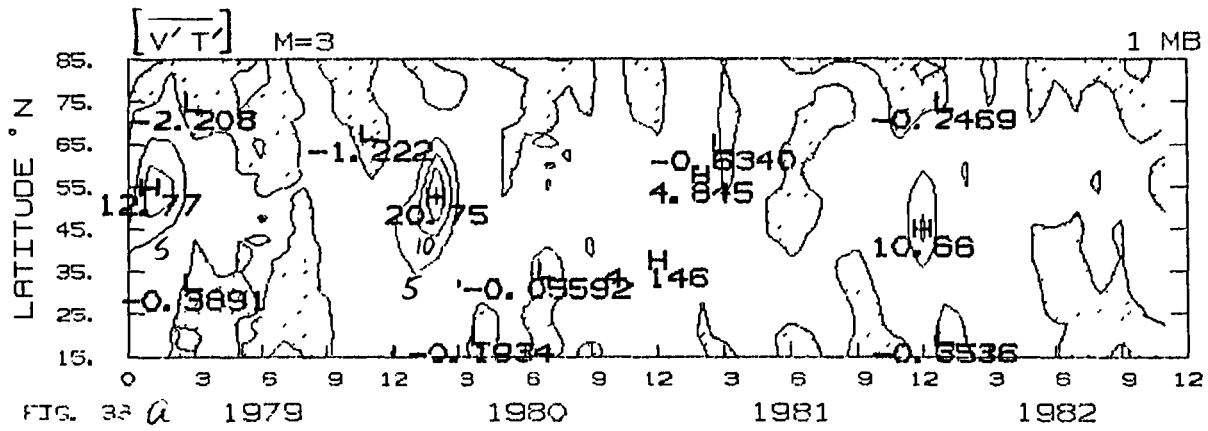


Fig 33. As in Fig. 31, but for wavenumber three.

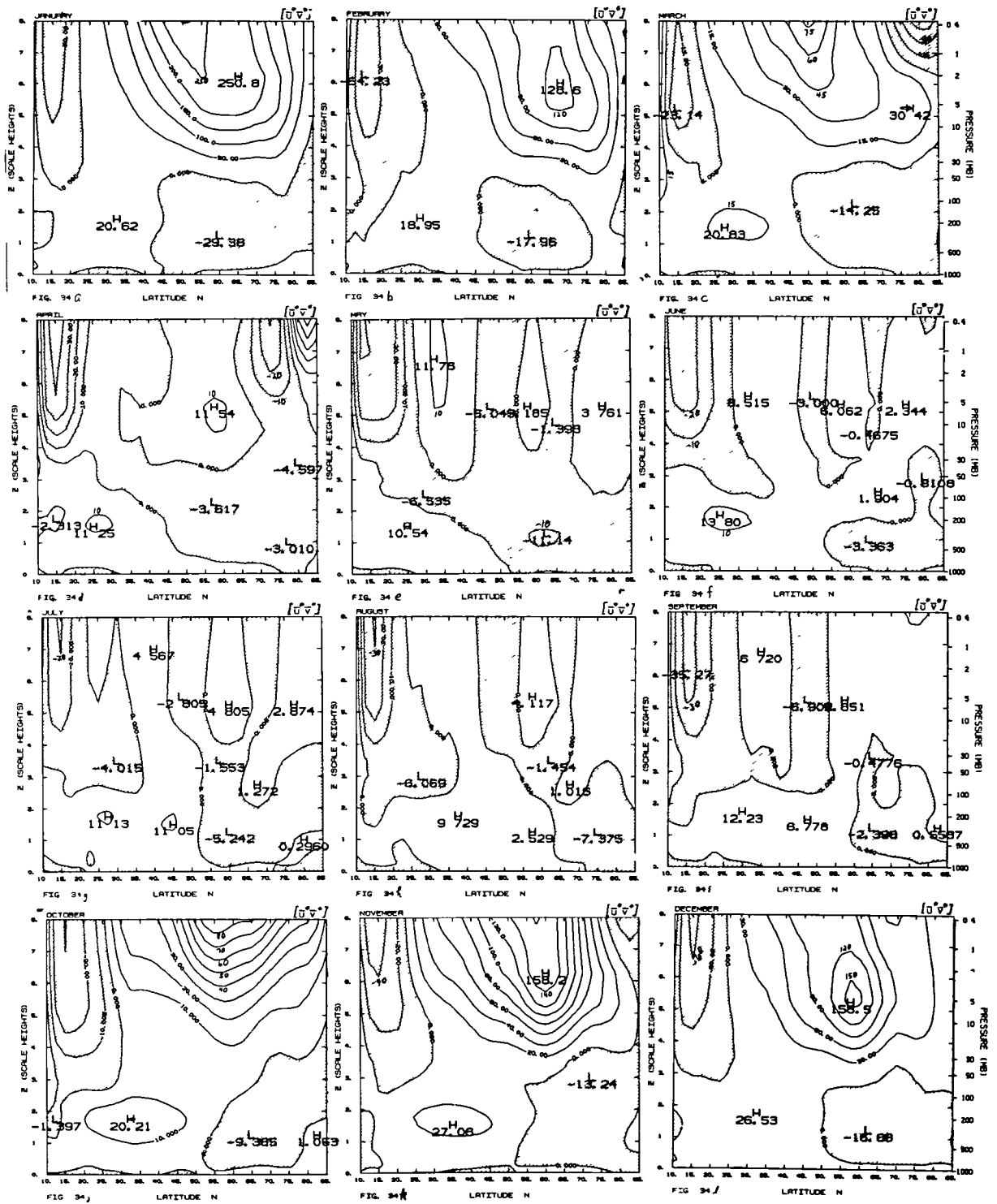


Fig 34. Monthly Northern Hemisphere four year mean northward flux of eastward momentum by the standing eddies, $[u^*v^*]$ (m^2/sec^2)

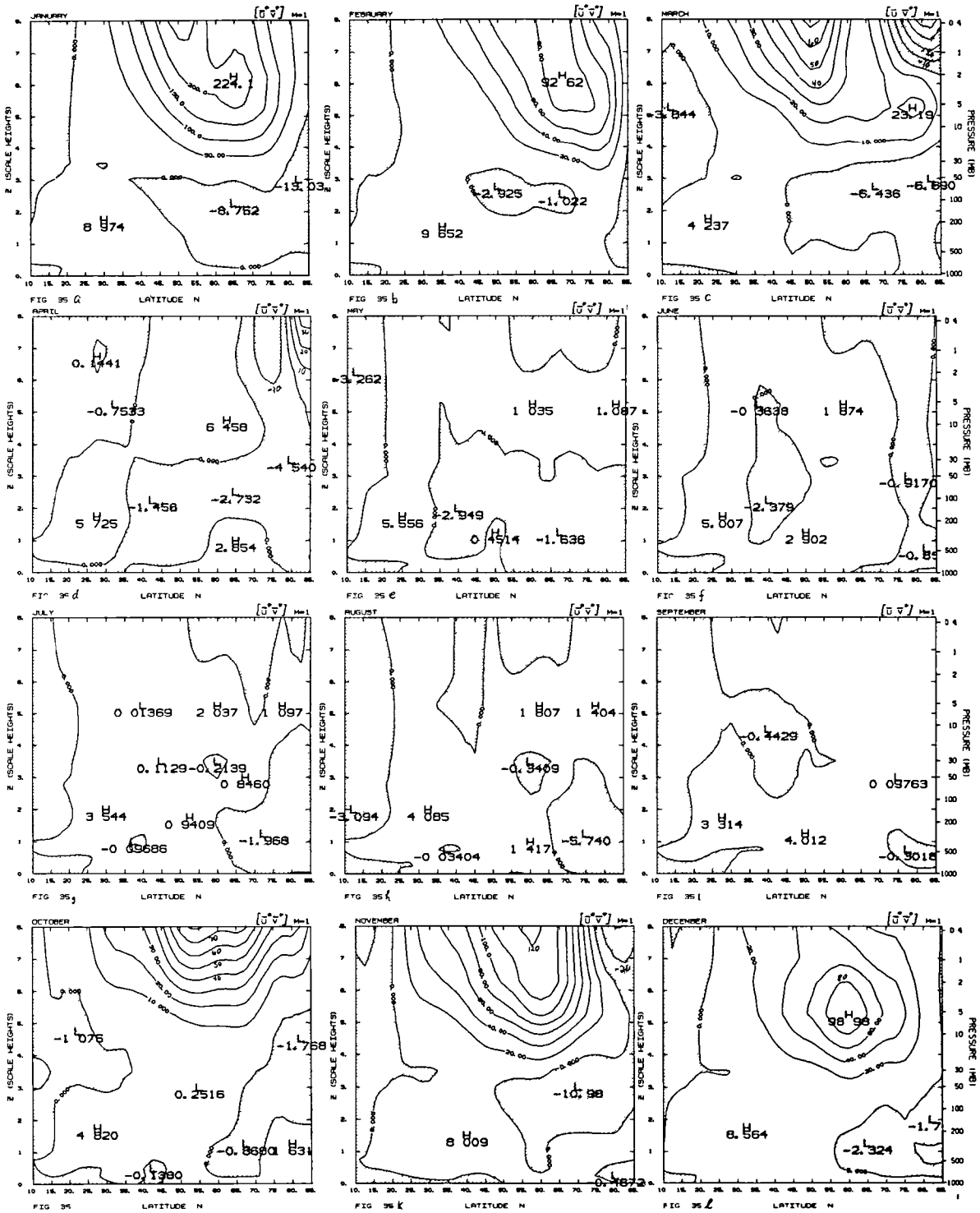


Fig 35. Northward flux of eastward momentum by the stationary eddy zonal wavenumber one $[\bar{u}^*v^*]_{m=1}$ (m^2/sec^2).

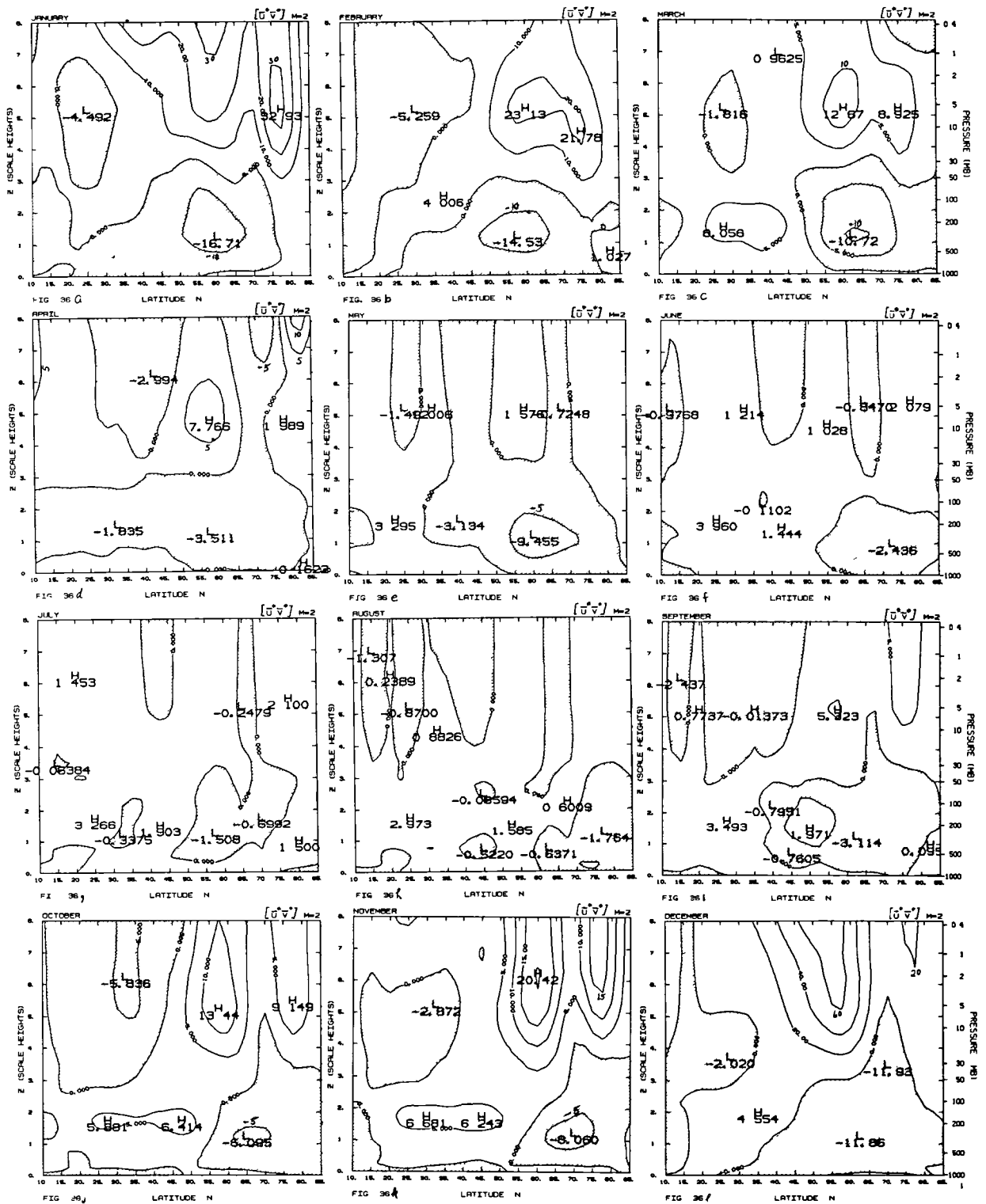


Fig 36. As in Figure 35, but for wavenumber two.

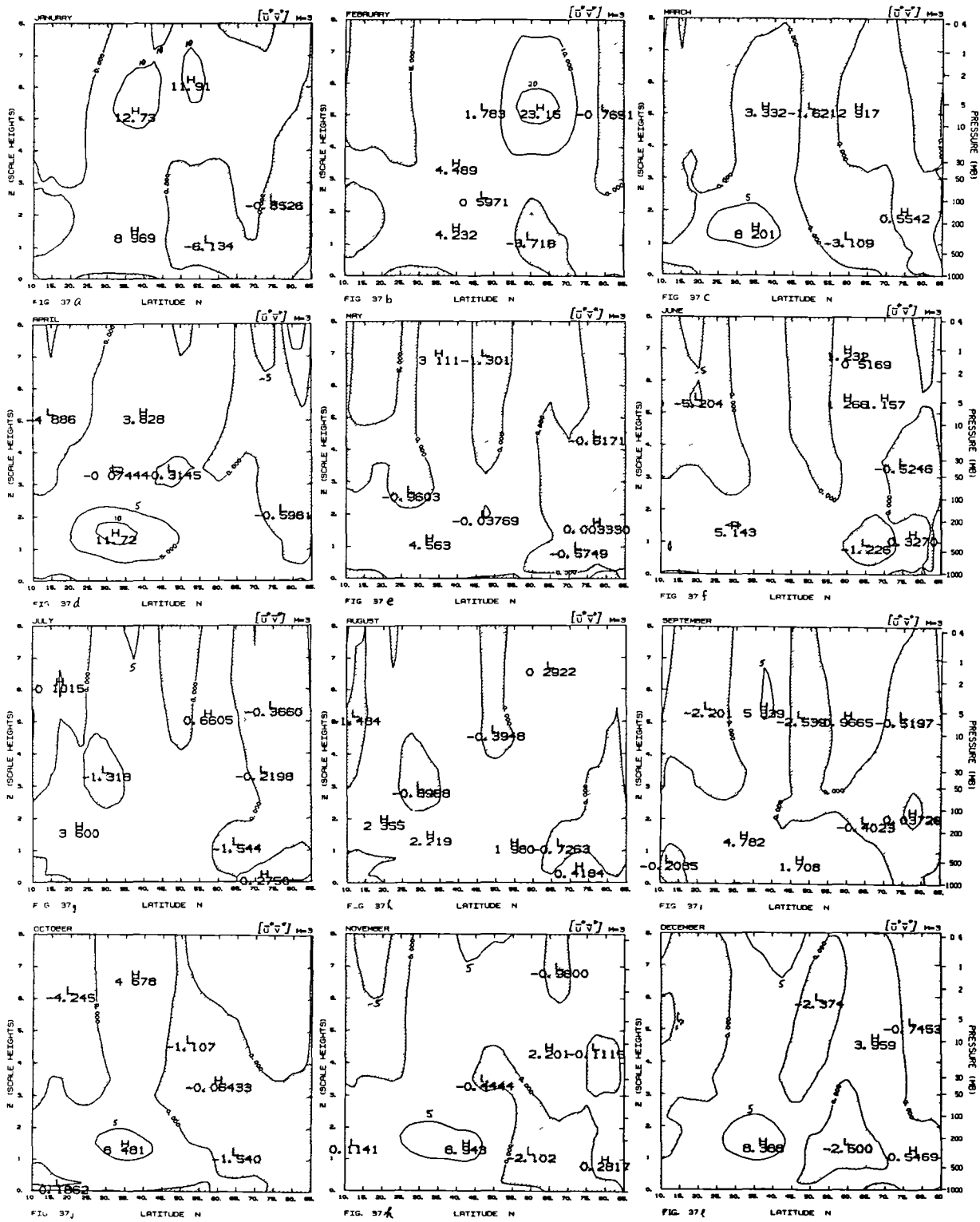


Fig 37. As in Figure 35, but for wavenumber three.

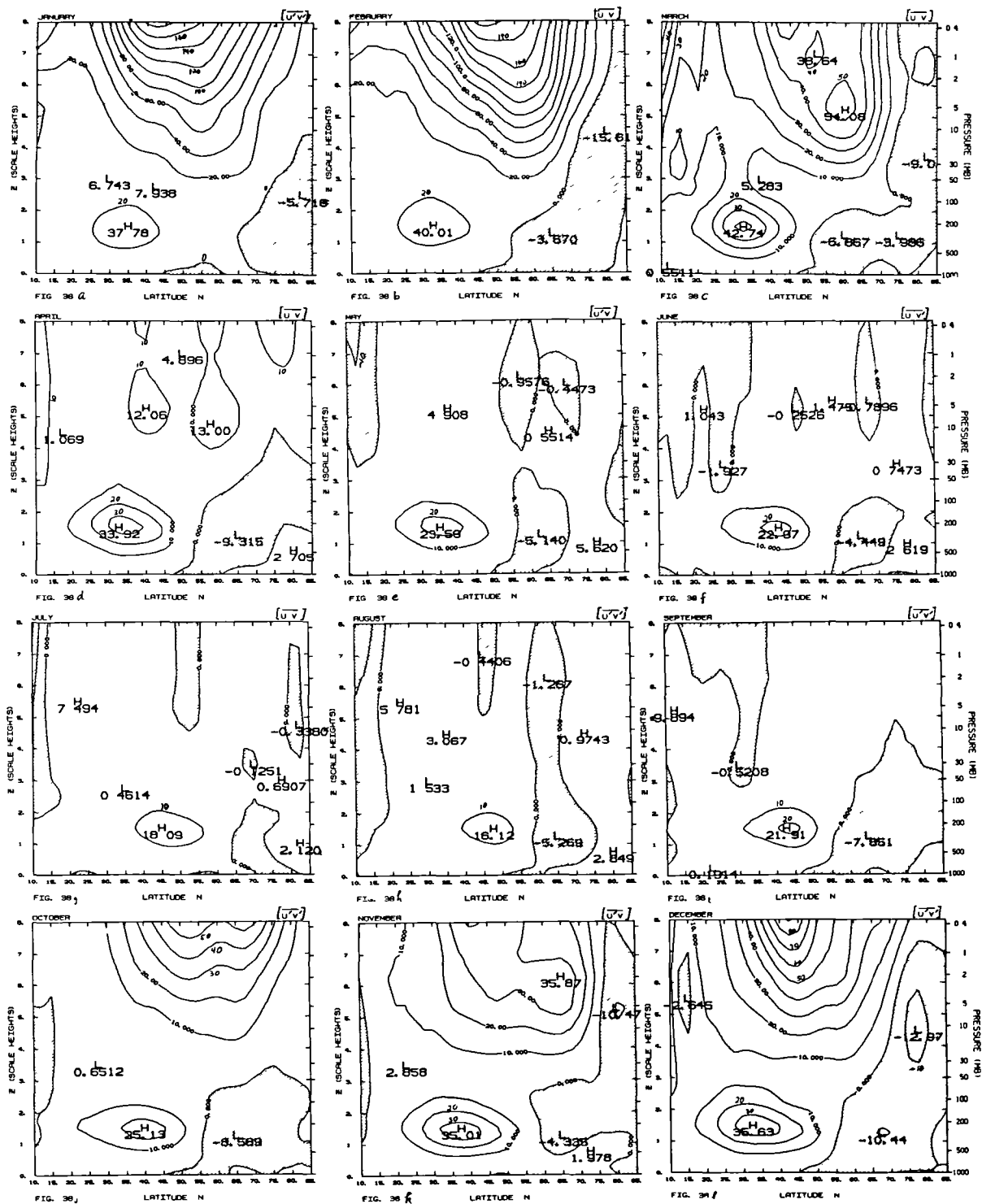


Fig 38. Monthly Northern Hemisphere four-year mean northward flux of eastward momentum by the transient eddies $[u'v']$ (m/sec)

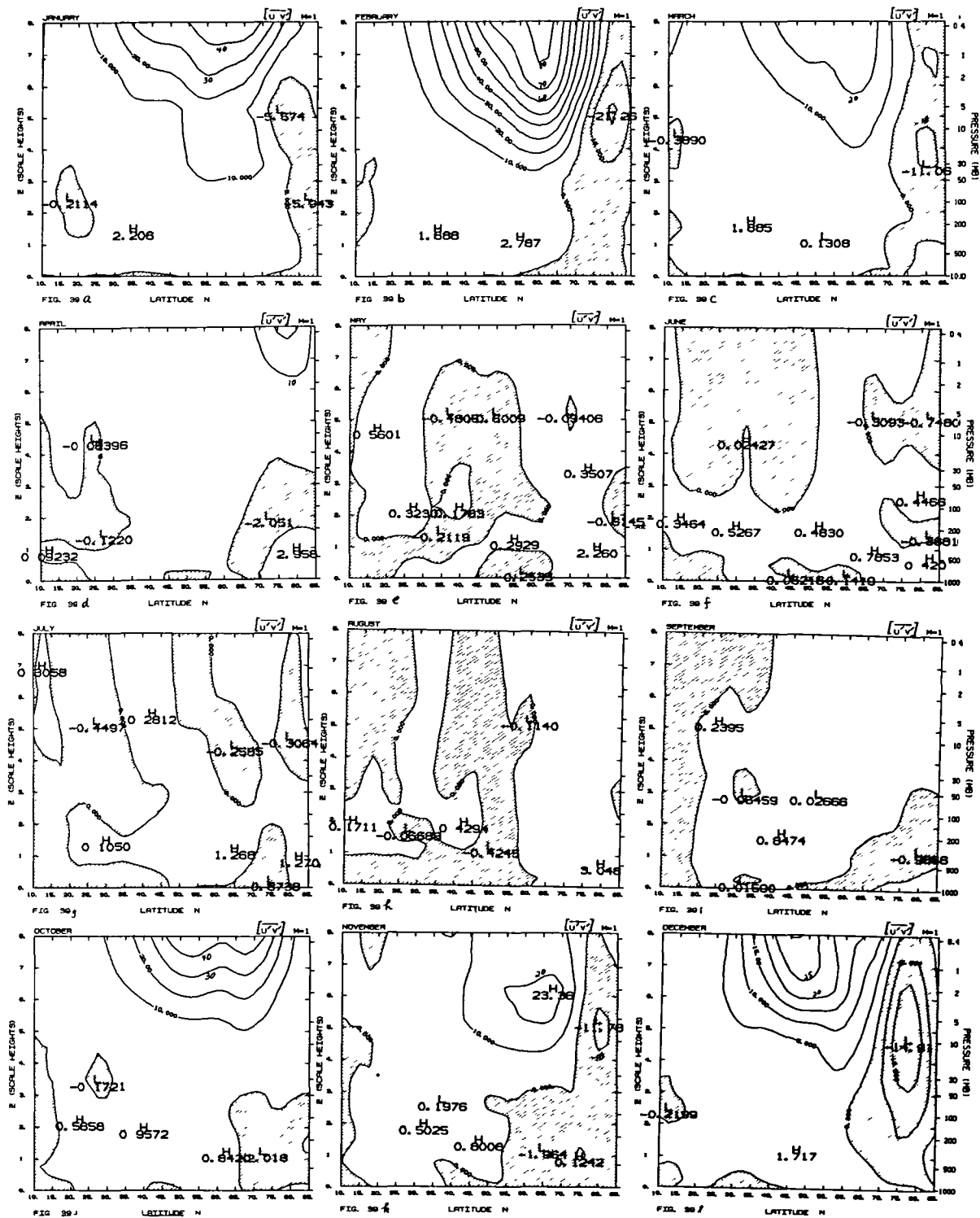


Fig 39. Northward flux of eastward momentum by the transient eddy zonal wavenumber one $[u'v']_{m=1}$ (m^2/sec^2).

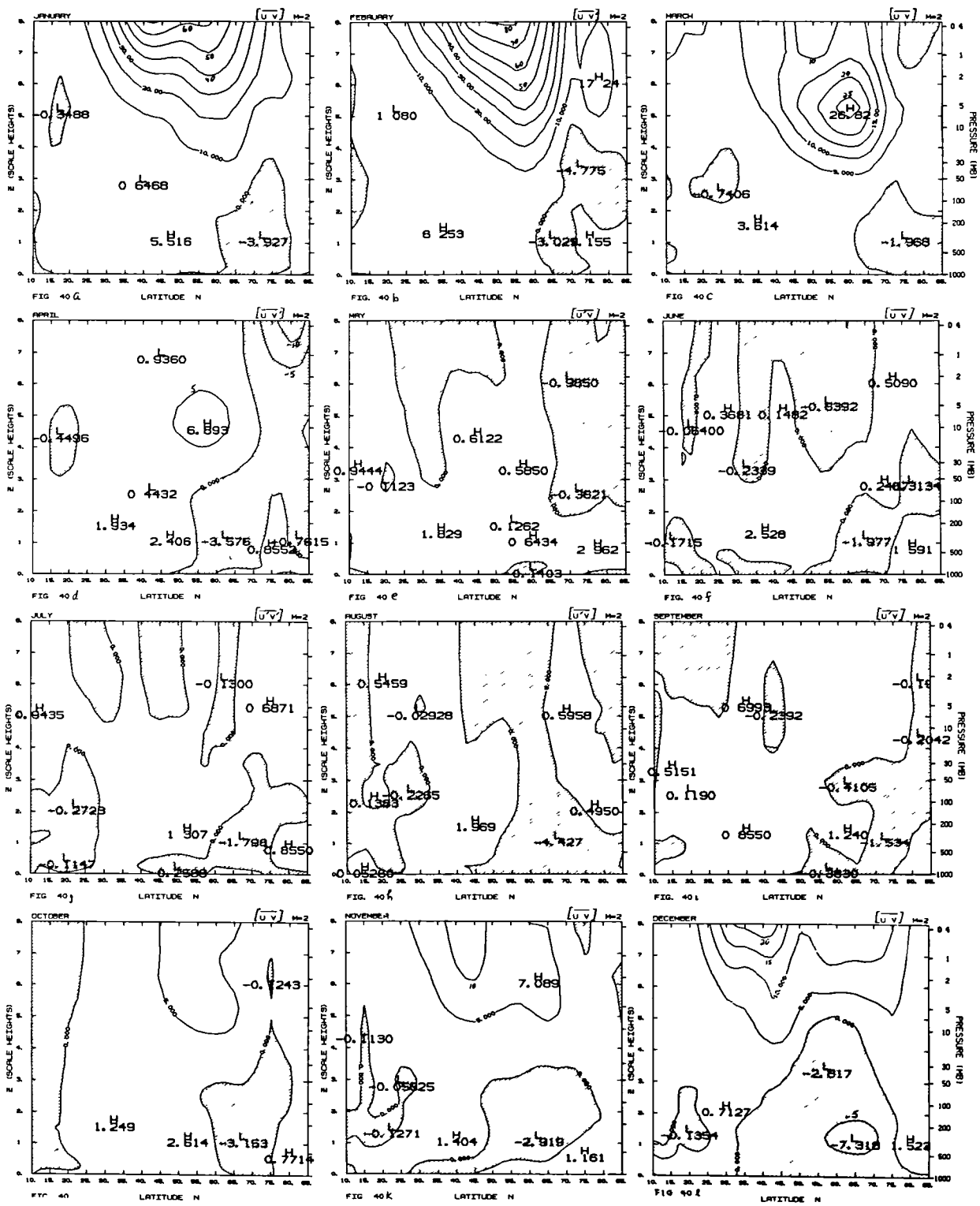


Fig 40. As in Figure 39, but for wavenumber two.

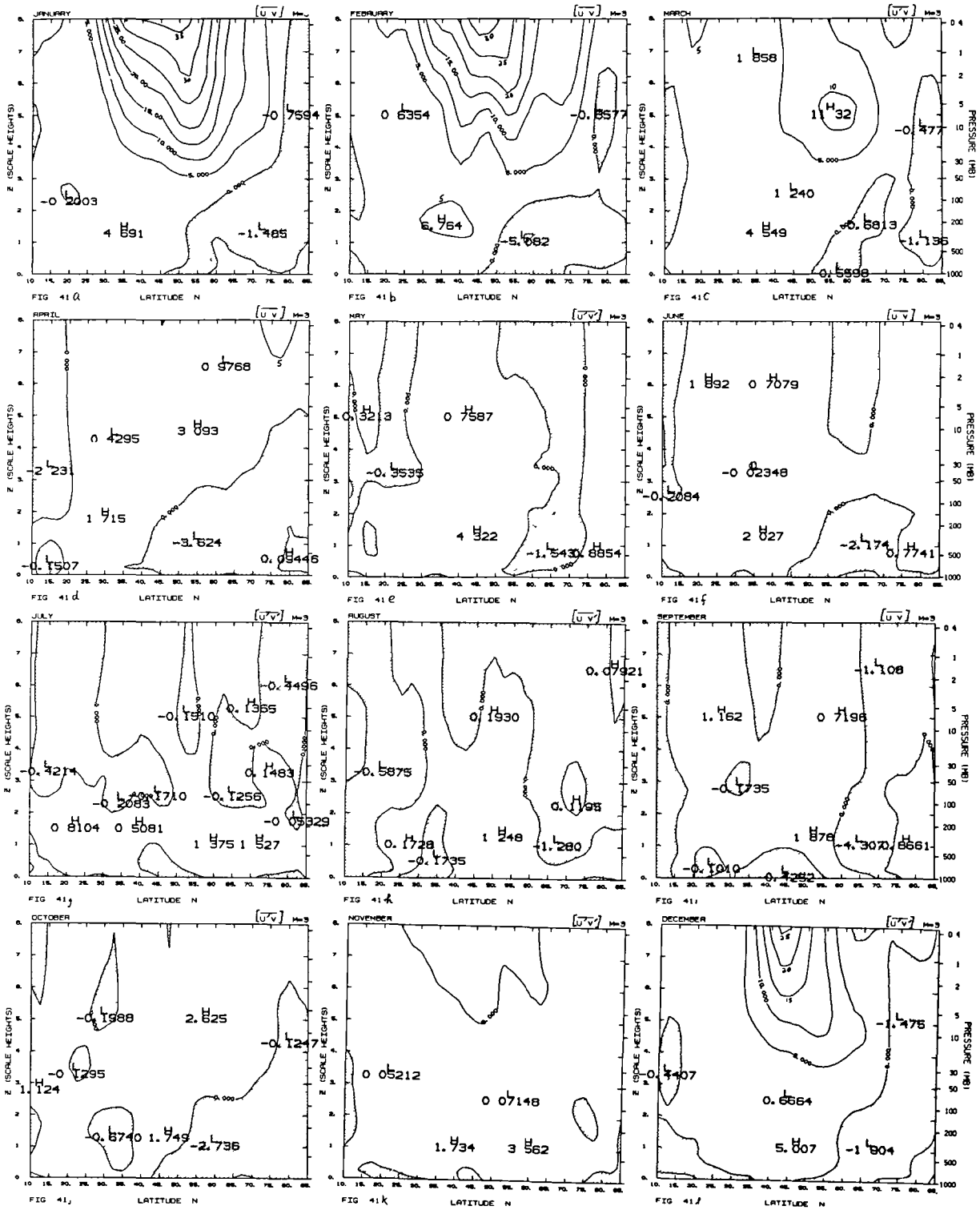


Fig 41. As in Figure 39, but for wavenumber three.

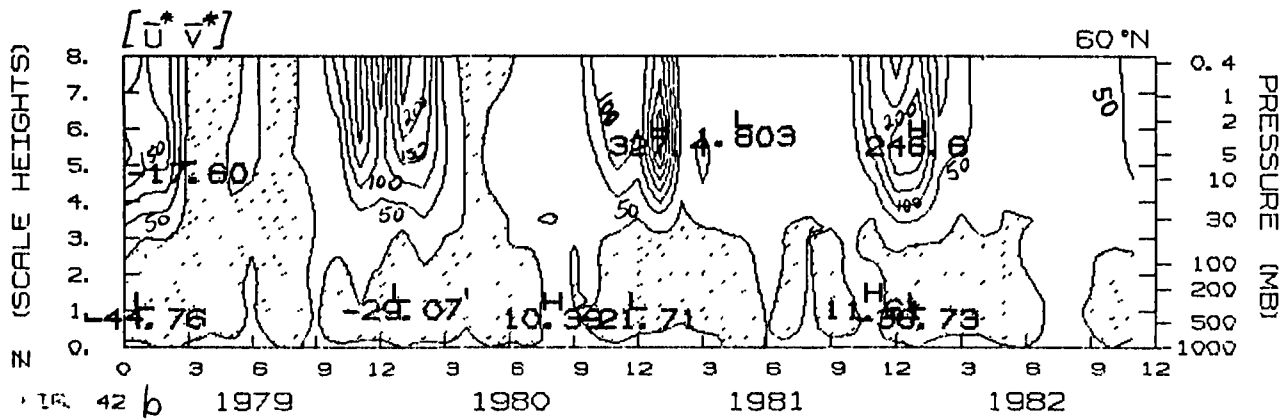
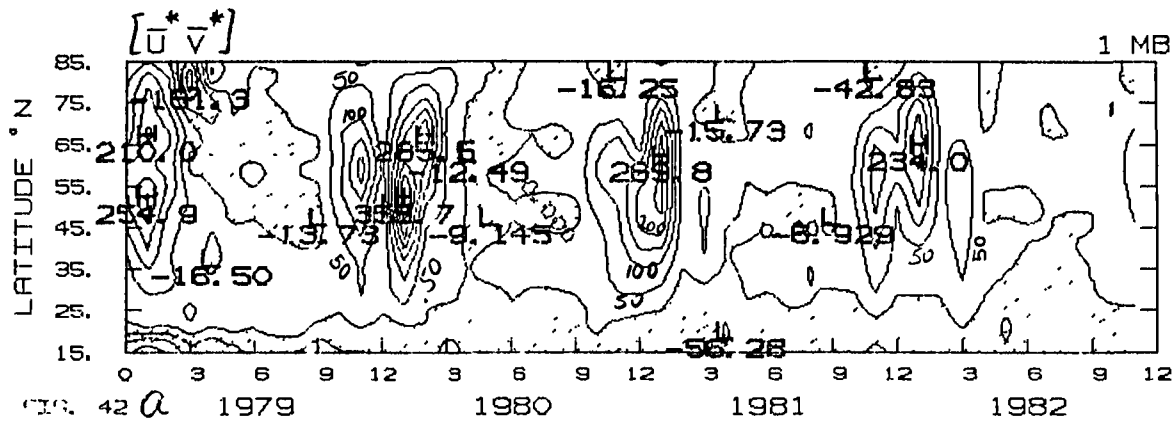


Fig 42. Northward flux of eastward momentum by the standing eddies, $[\bar{u}^* \bar{v}^*]$ (m^2/sec^2), (a) time-latitude section at 1 mb, (b) time-height section at 60°N.

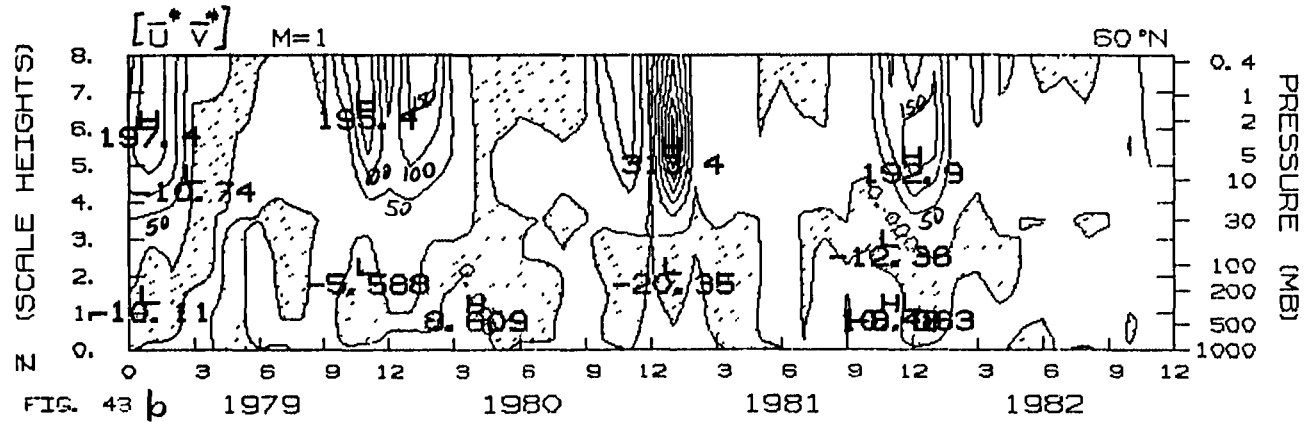
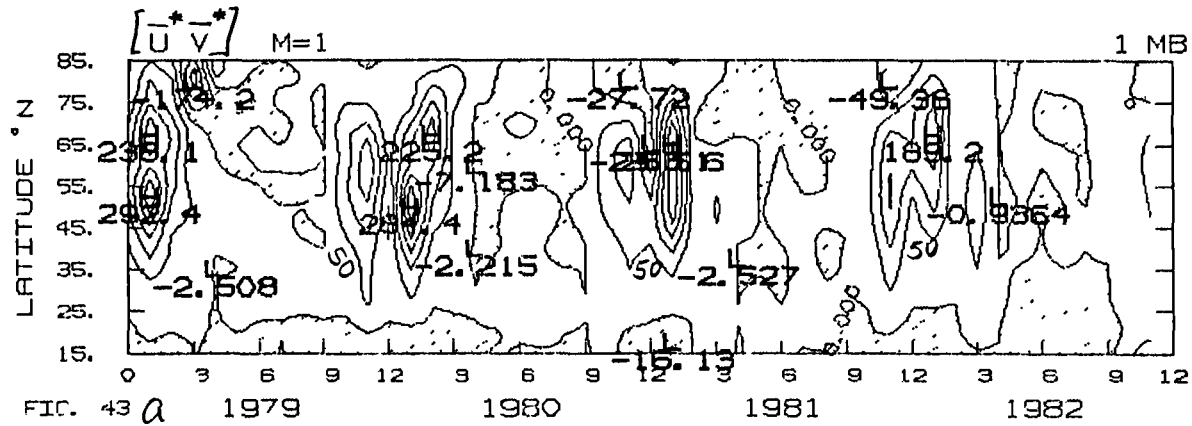


Fig 43. Northward flux of momentum by the stationary eddy zonal wavenumber one $[\bar{u}^* \bar{v}^*]_{m=1}$ (m^2/sec^2), (a) time-latitude section at 1 mb, (b) time-height section at $60^\circ N$.

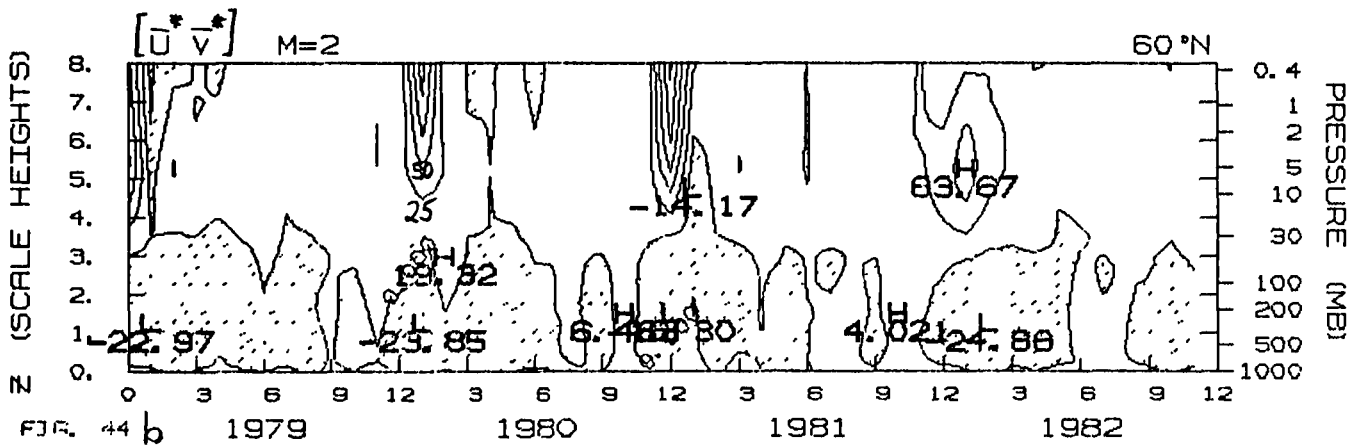
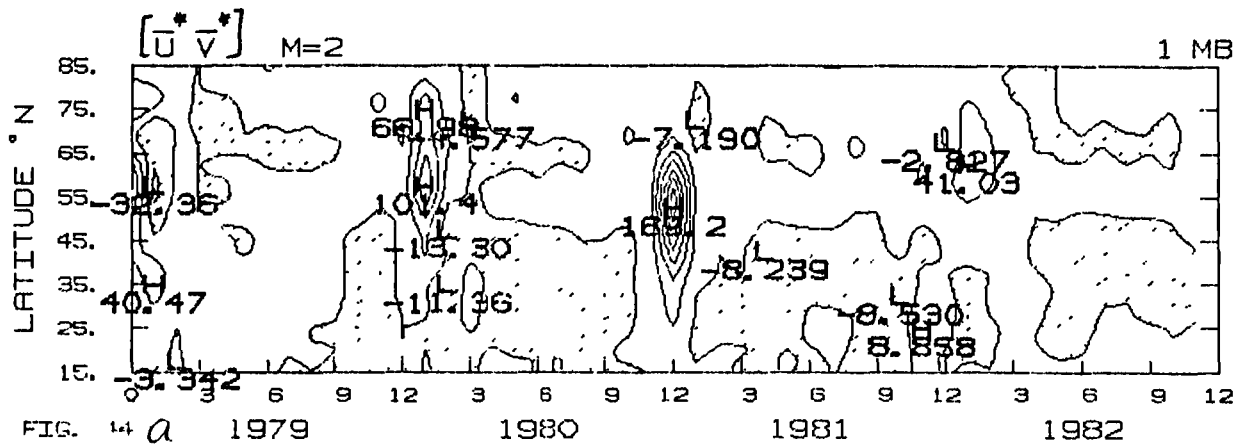


Fig 44. As in Fig. 43, but for wavenumber two.

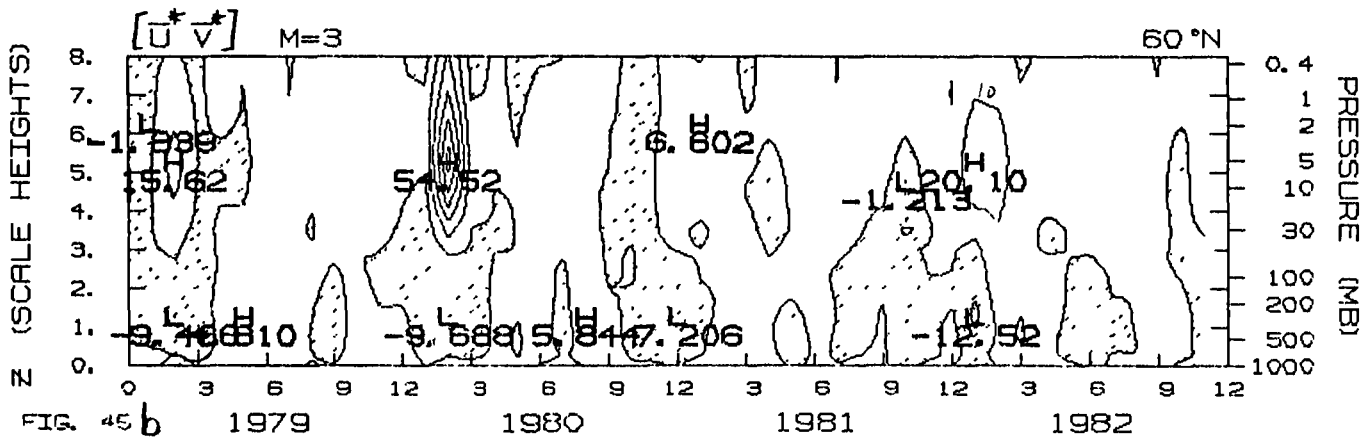
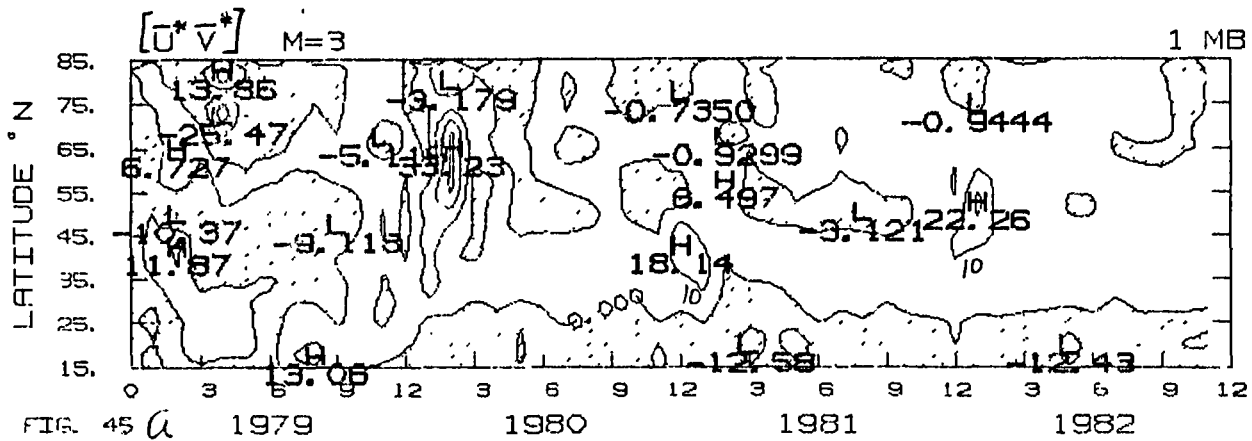


Fig 45. As in Fig. 43, but for wavenumber three.

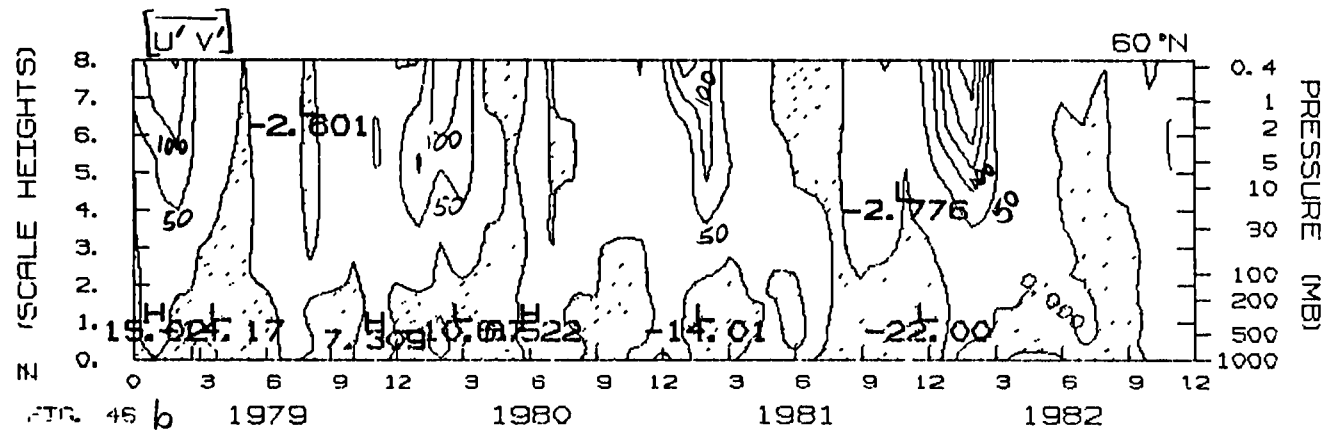
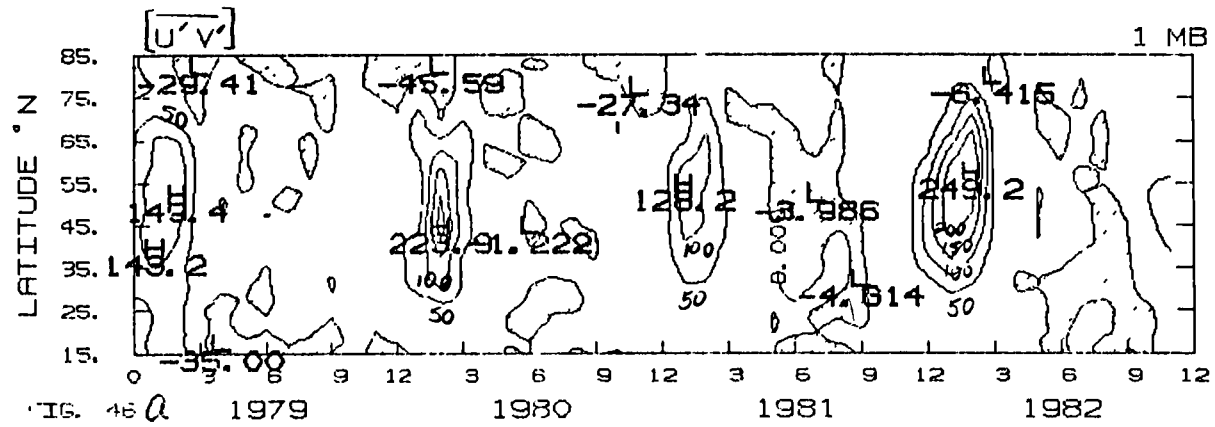


Fig 46. As in Fig. 42, but for the northward flux of momentum by transient eddies, $[u'v']$ (m^2/sec^2).

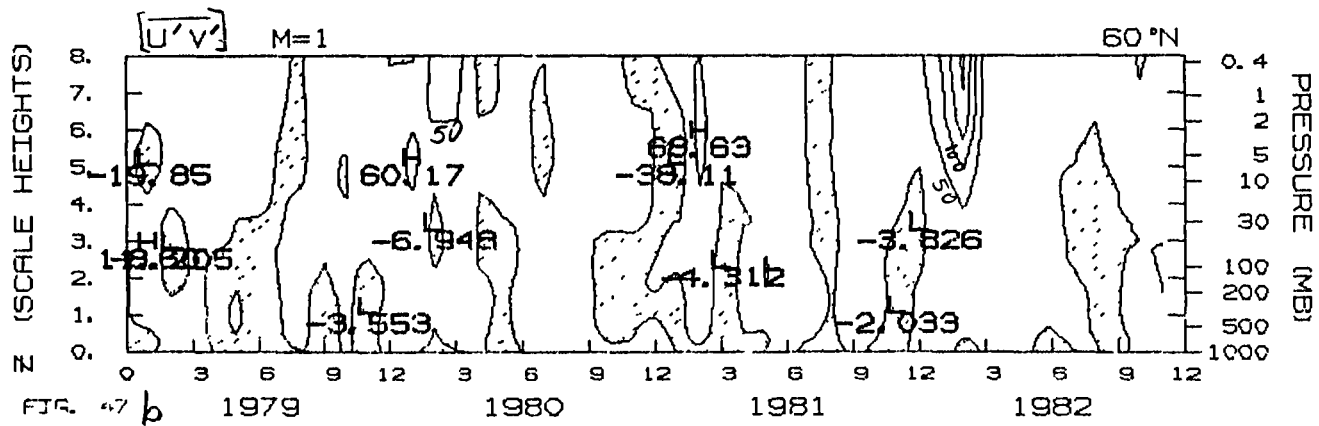
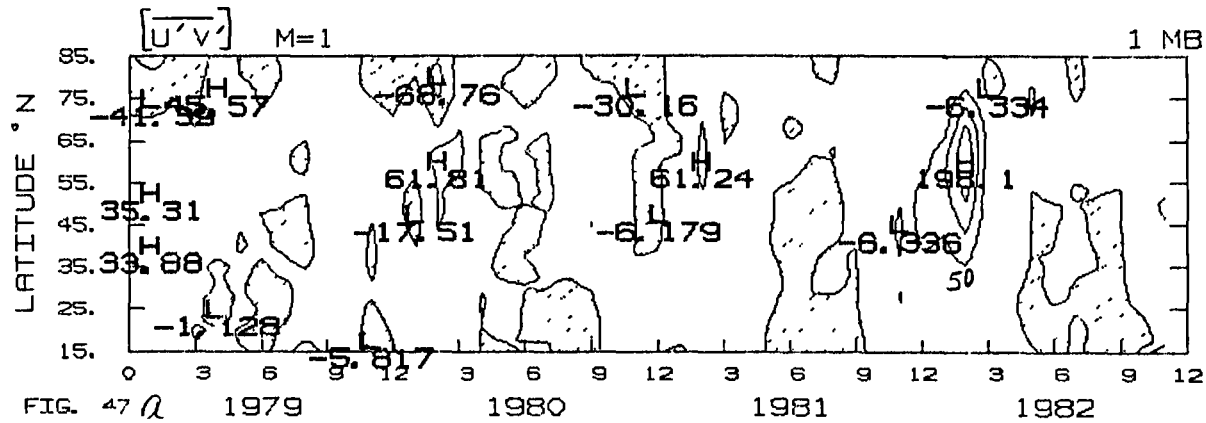


Fig 47. Northward flux of momentum by the transient eddy zonal wavenumber one $[\overline{u'v'}]_{m=1}$ (m^2/sec^2), (a) time-latitude section at 1 mb, (b) time-height section at 60°N .

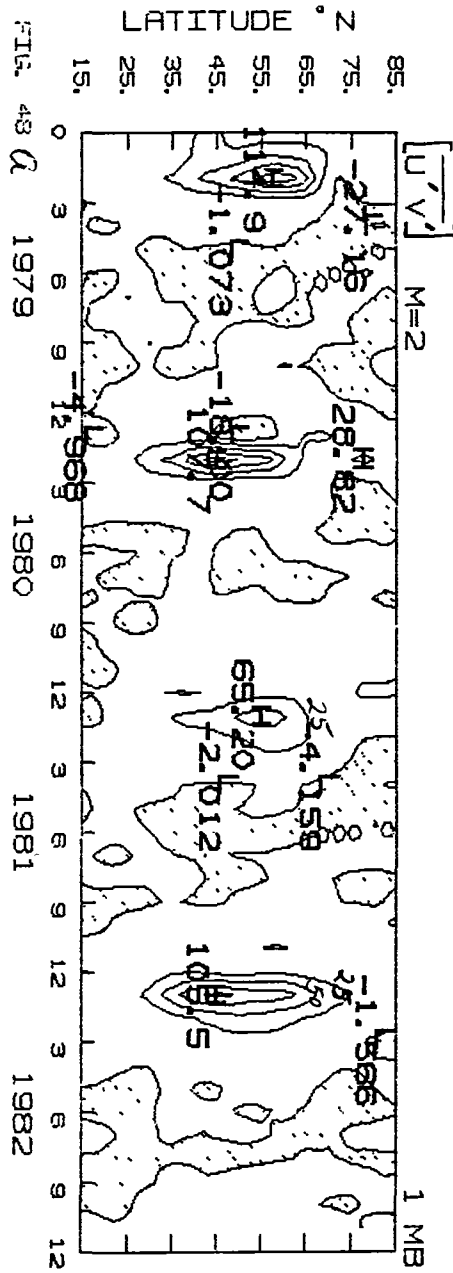
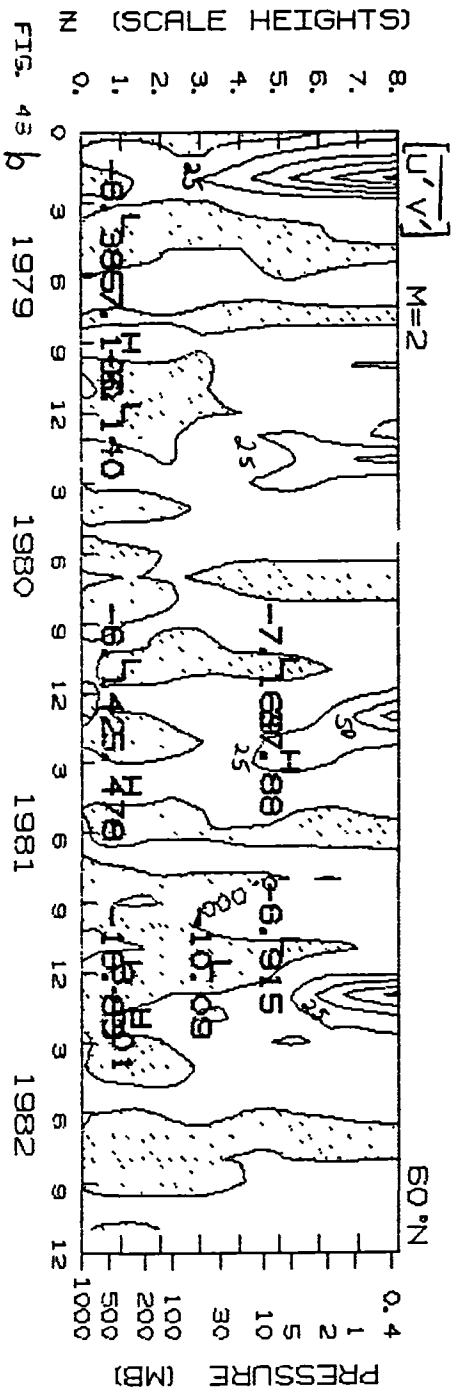


Fig 48. As in Fig. 47, but for wavenumber two.

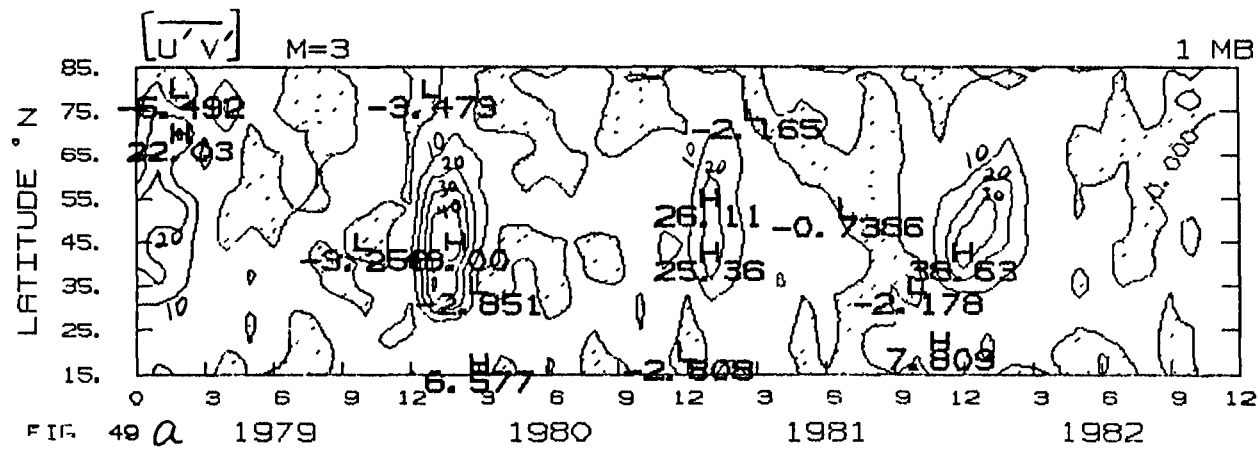


FIG. 49 a 1979 1980 1981 1982

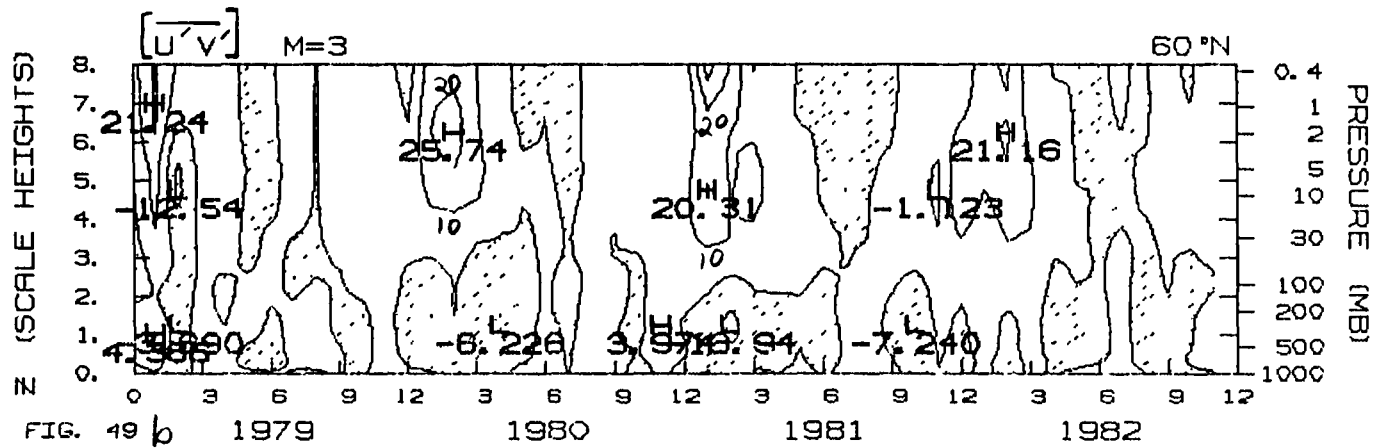


FIG. 49 b 1979 1980 1981 1982

Fig 49. As in Fig. 47, but for wavenumber three.

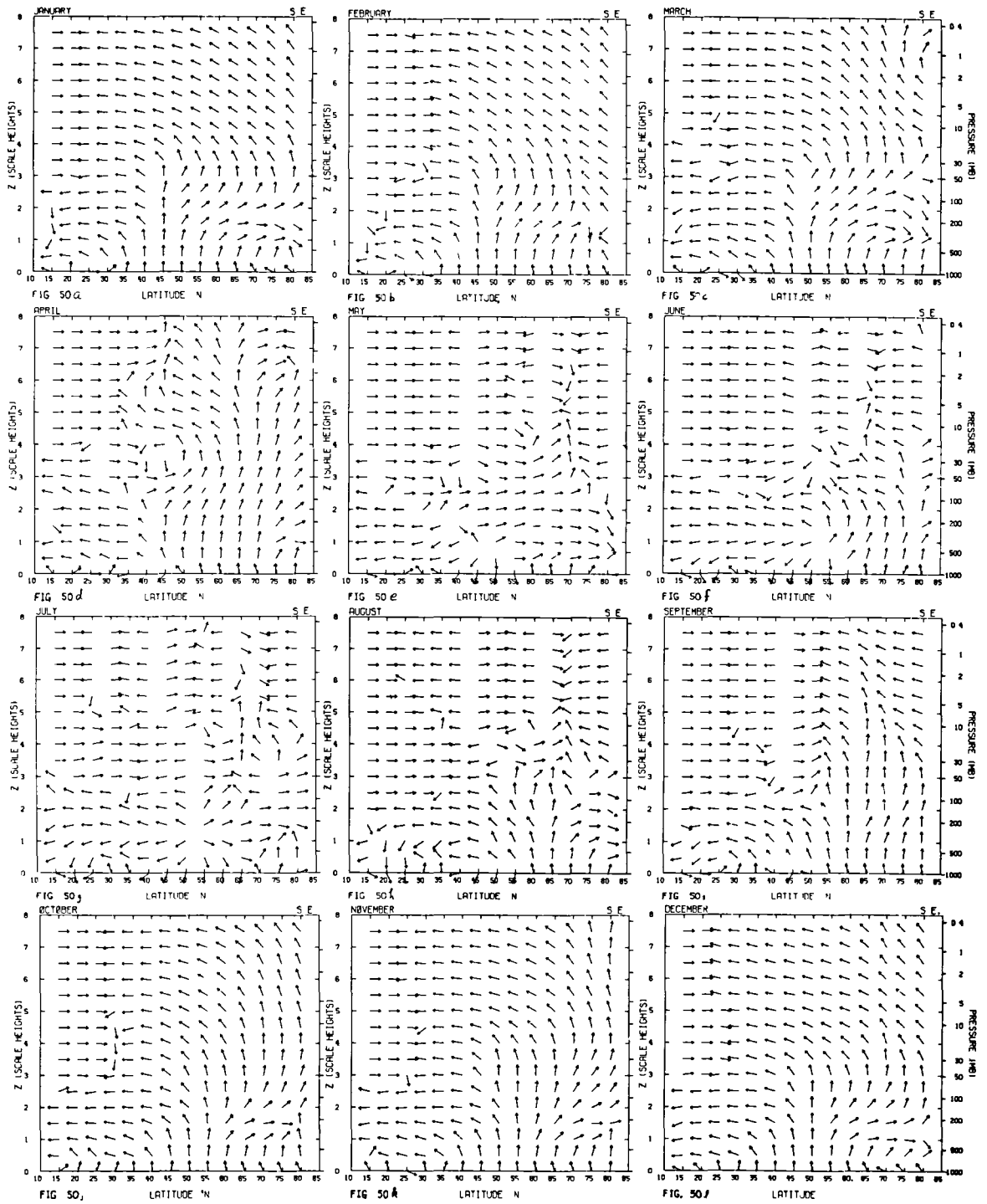


Fig 50. Monthly Northern Hemisphere four-year mean Eliassen-Palm flux vectors from the standing eddy fluxes. All of the arrows are the same length. The vertical vector component is magnified by a factor of 100 with respect to the horizontal component.

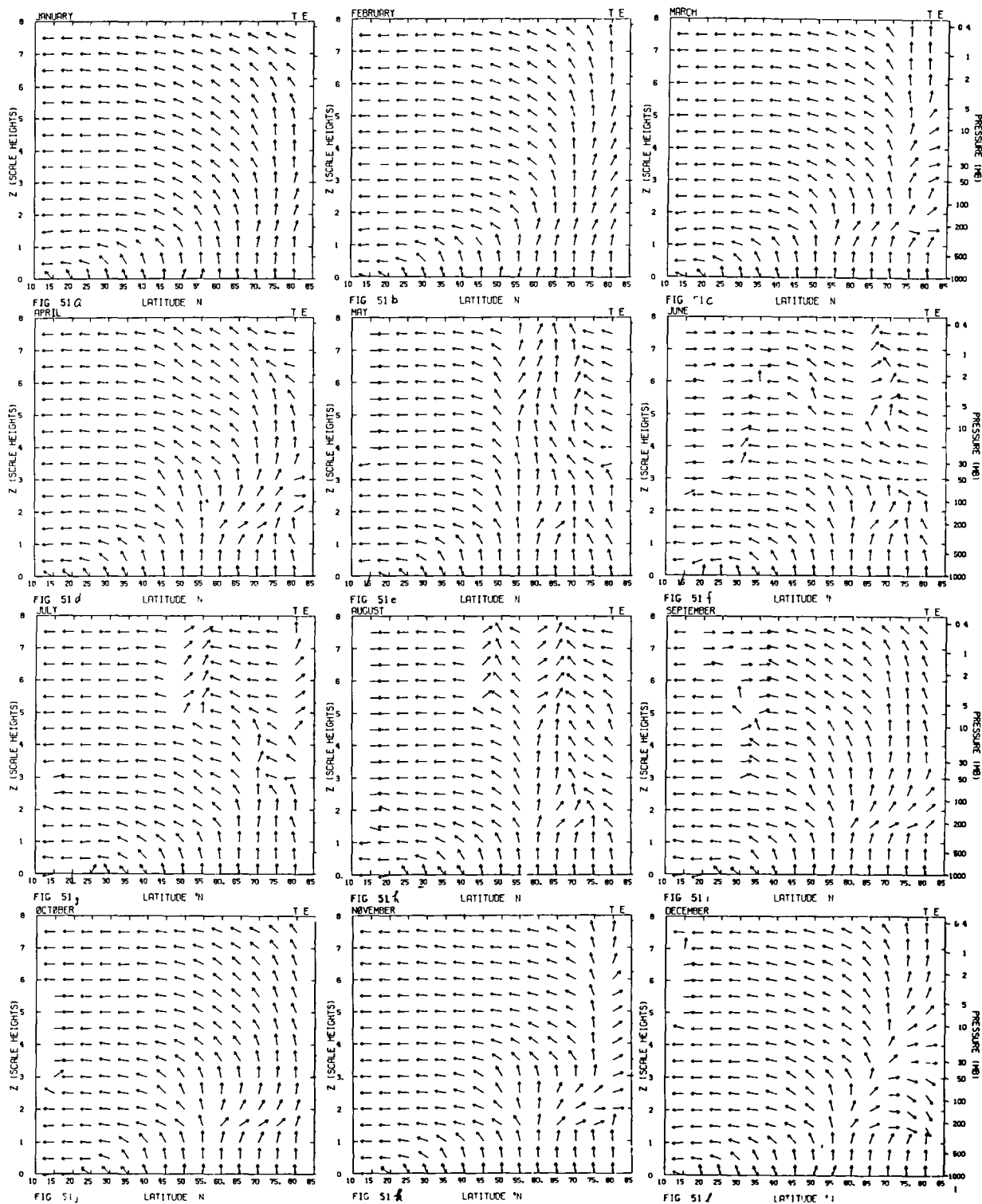


Fig 51. As in Figure 50, but for transient eddy fluxes.

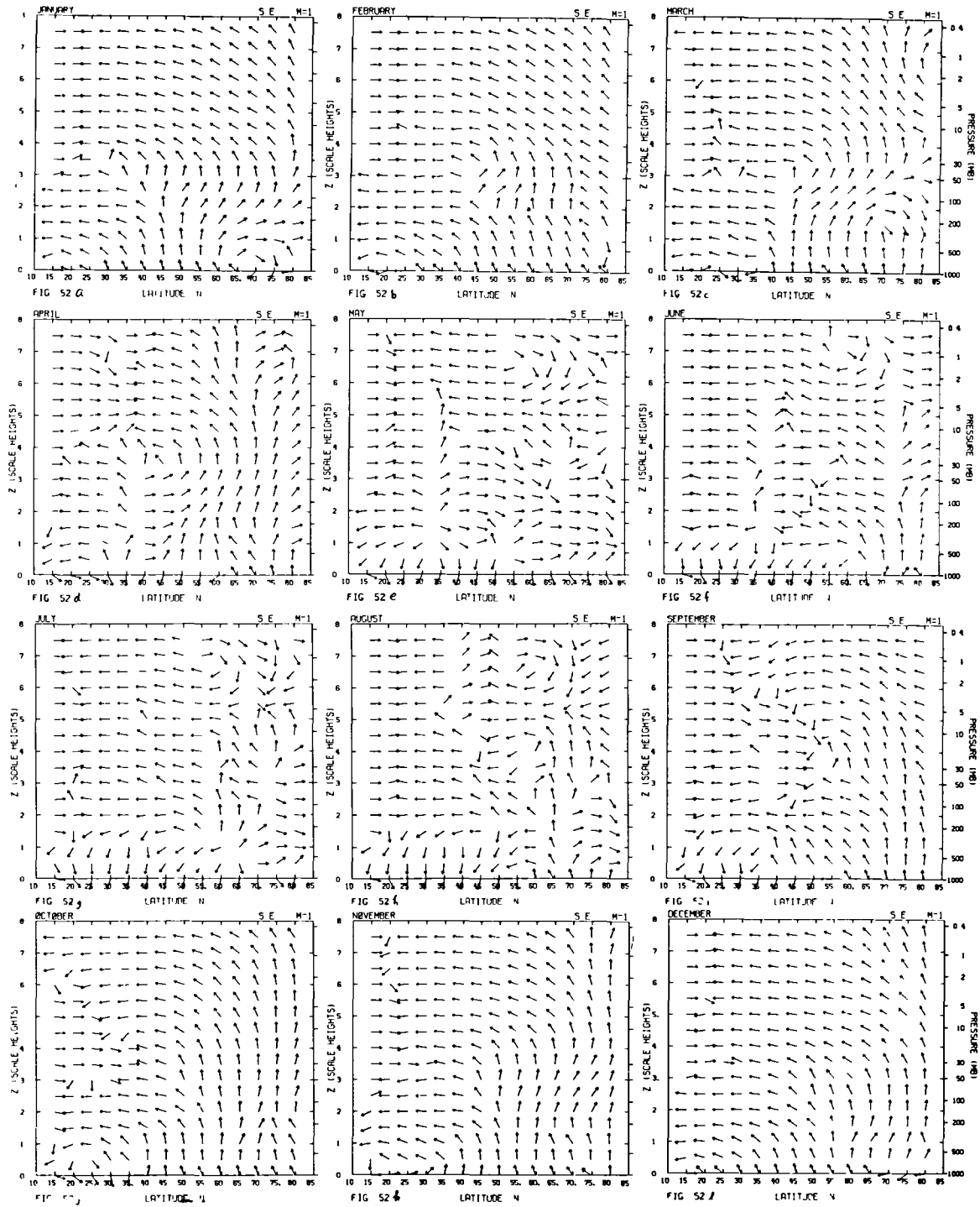


Fig 52. Monthly Northern Hemisphere four-year mean Eliassen-Palm flux vectors from the standing eddy zonal wavenumber one. All the arrows are the same length. The vertical vector component is magnified by a factor of 100 relative to the horizontal component.

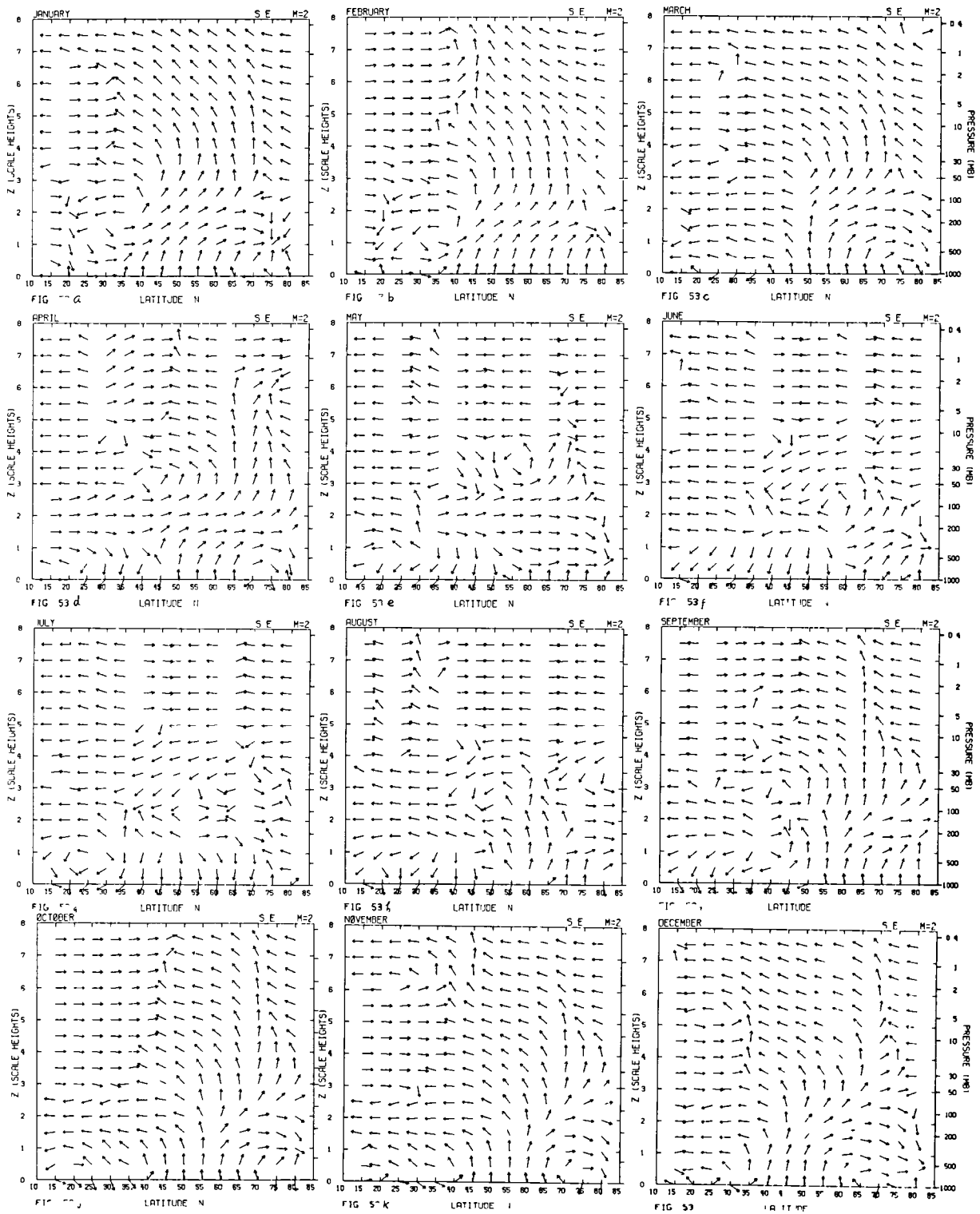


Fig 53. As in Figure 52, but for wavenumber two.

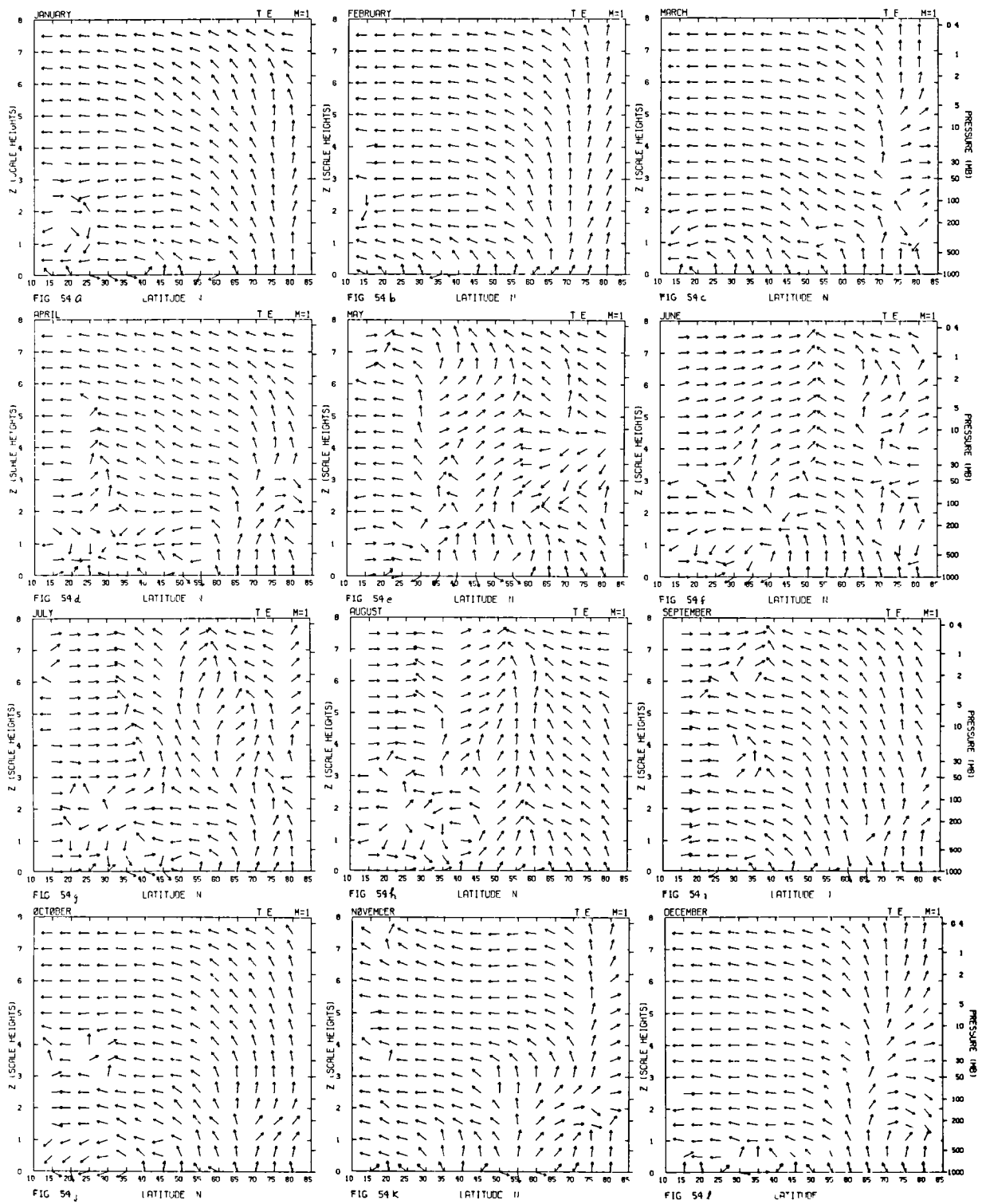


Fig 54. As in Figure 52, but for transient eddy fluxes.

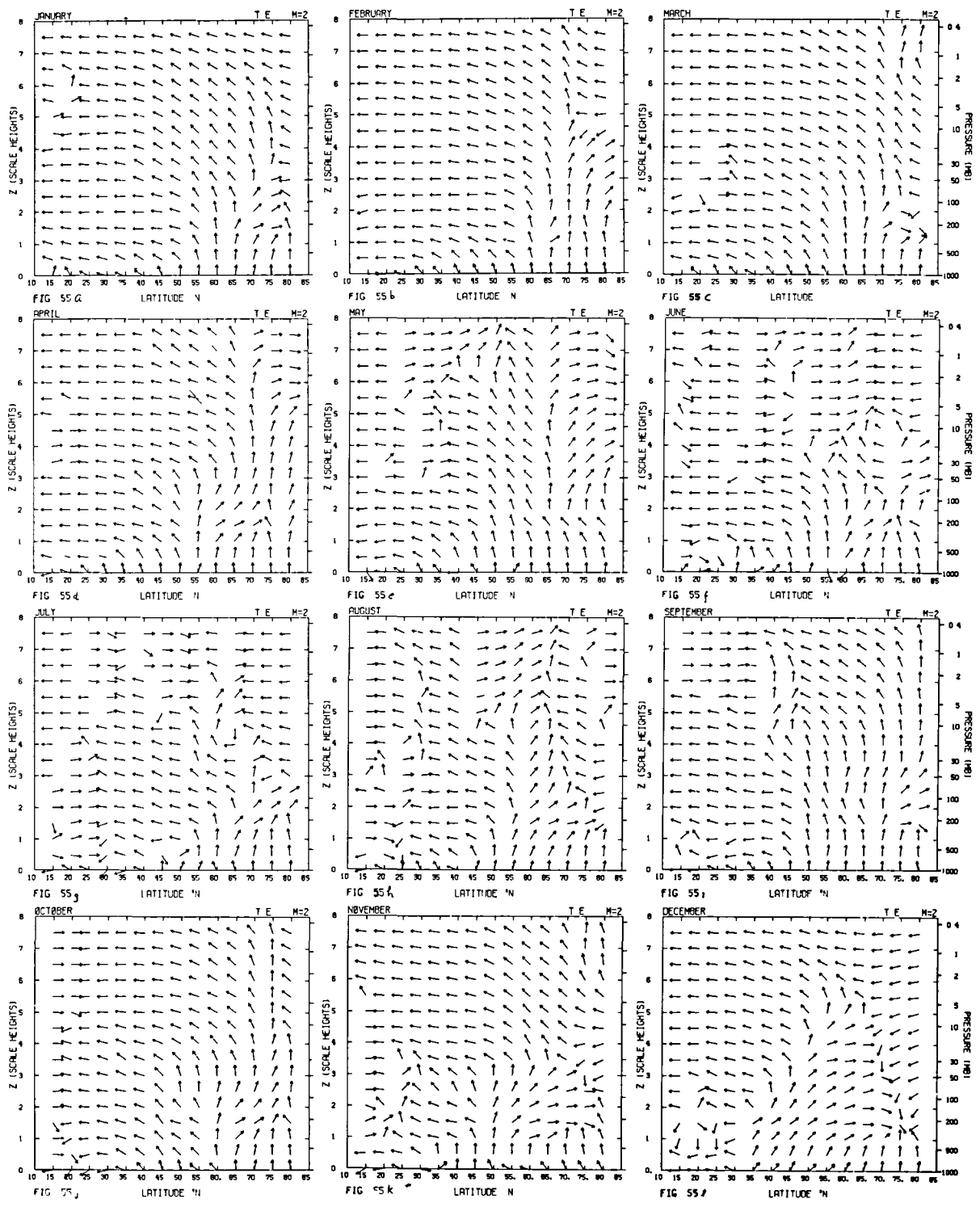


Fig 55. As in Figure 52, but for transient eddy zonal wavenumber two.

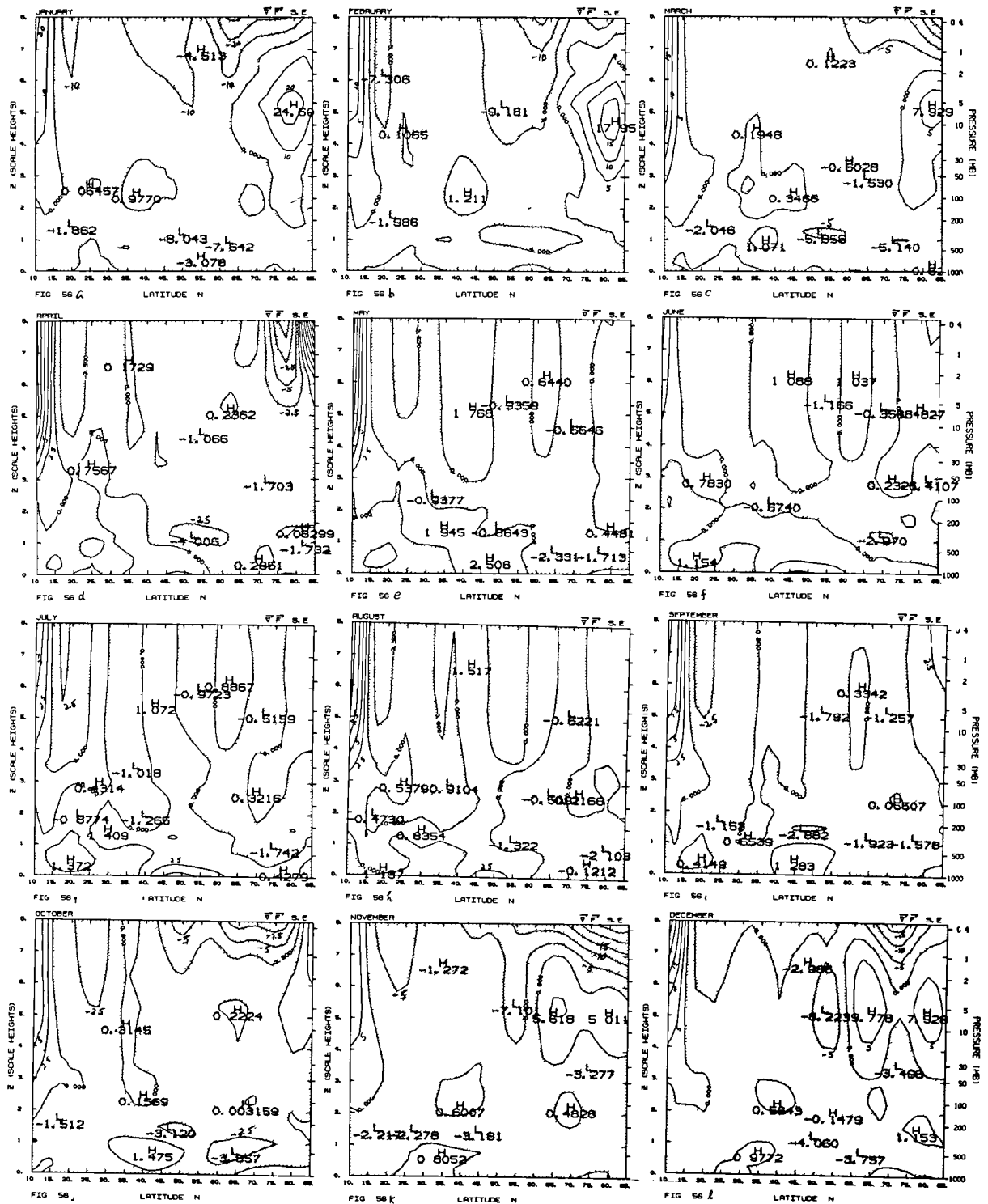


Fig 56. Monthly Northern Hemisphere four-year mean Eliassen-Palm flux divergences (10^{-5}m/sec^2) resulting from the standing eddies

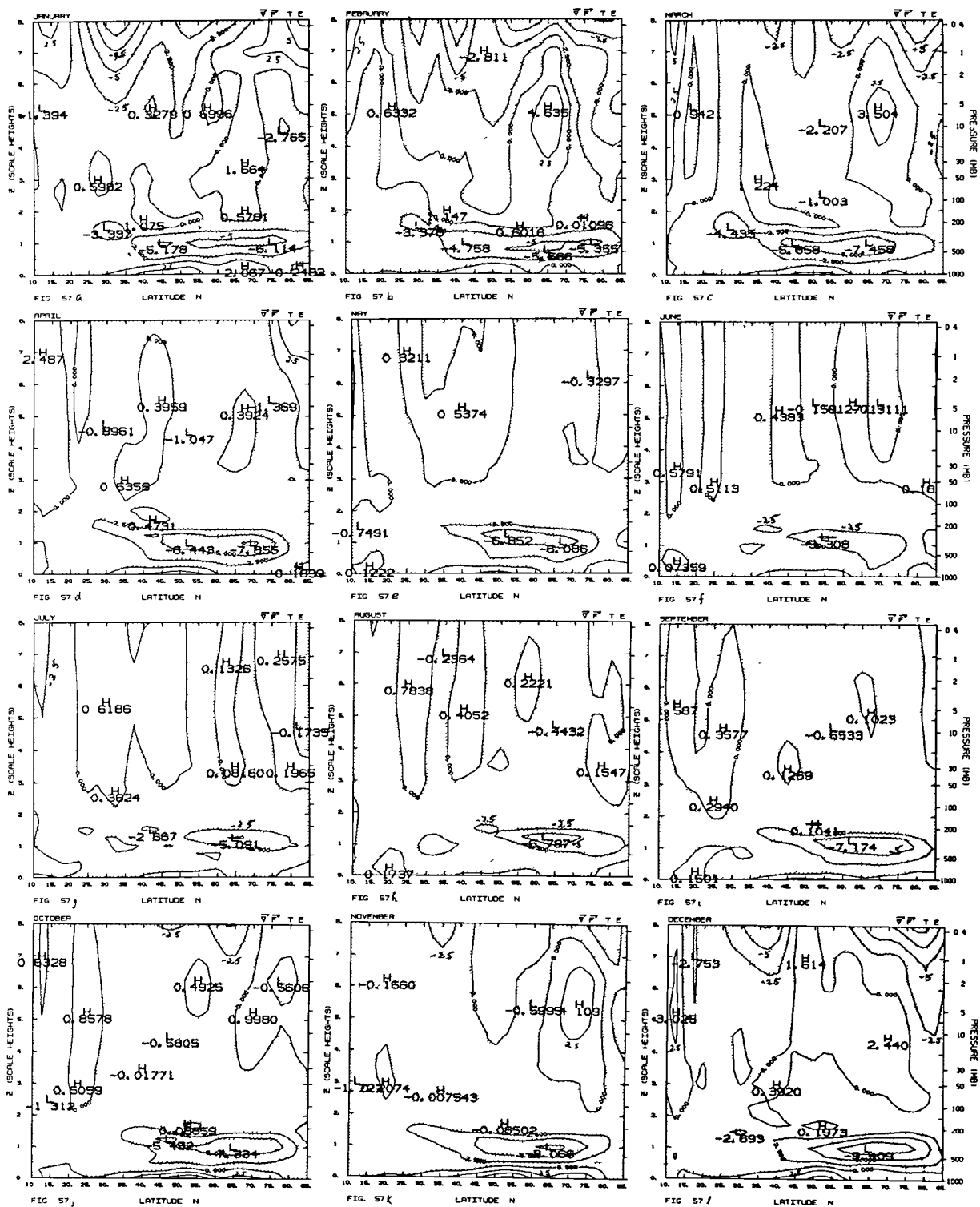


Fig 57. As in Figure 56, but for transient eddies.

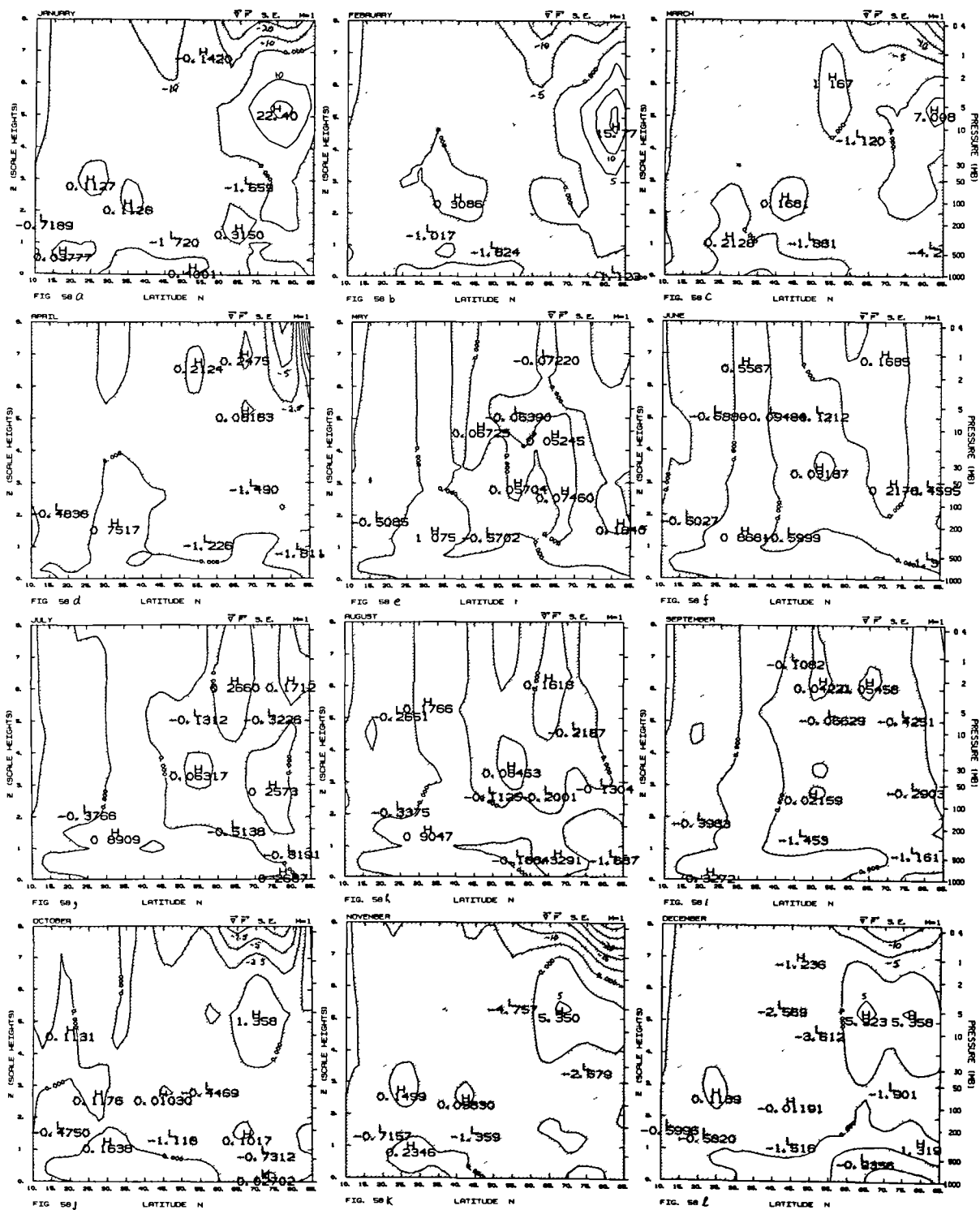


Fig 58. Northern Hemisphere four-year mean Eliassen-Palm flux divergences (10^{-5} m/sec^2) resulting from the standing eddy zonal wavenumber one.

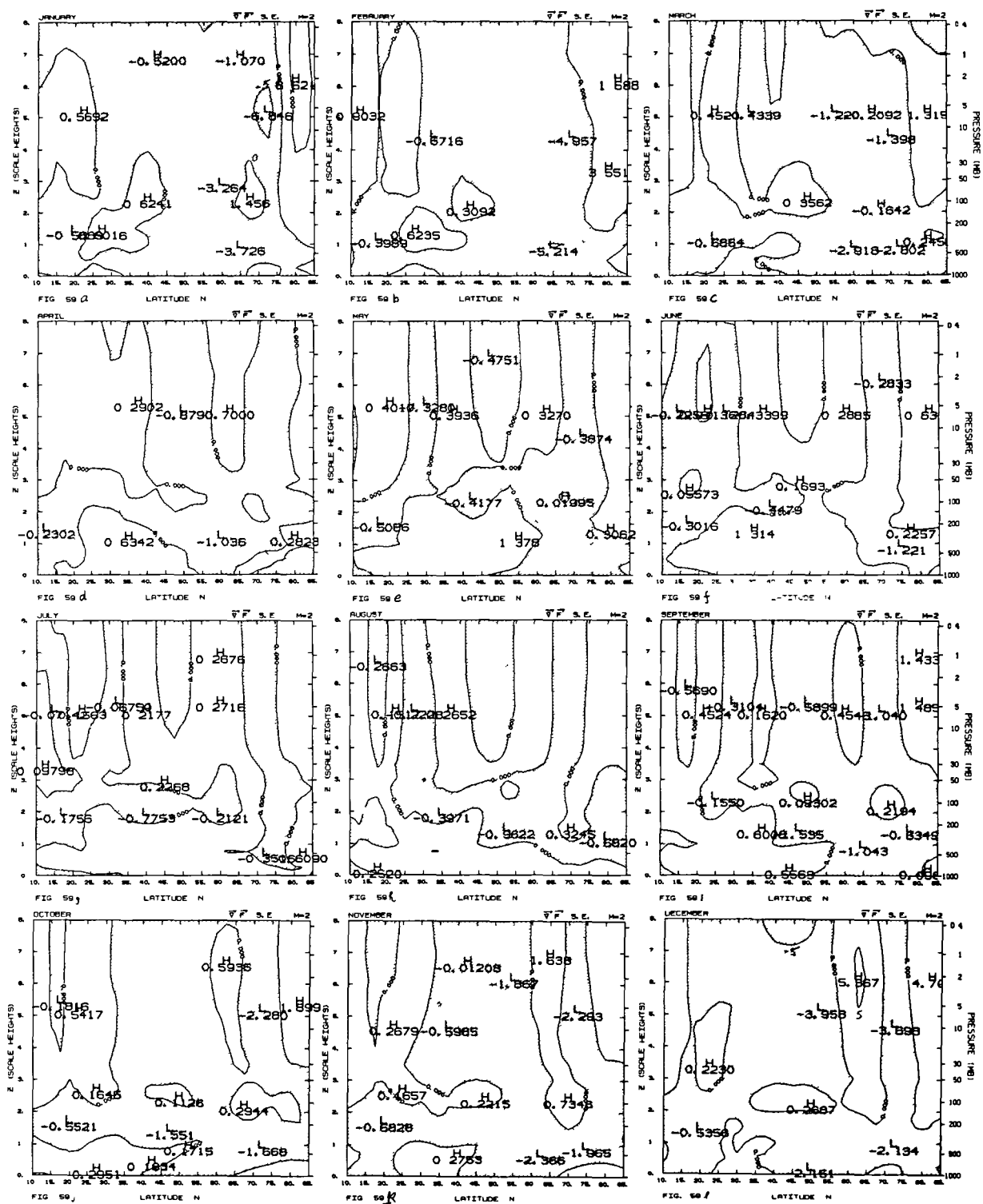


Fig 59. As in Figure 58, but for wavenumber two.

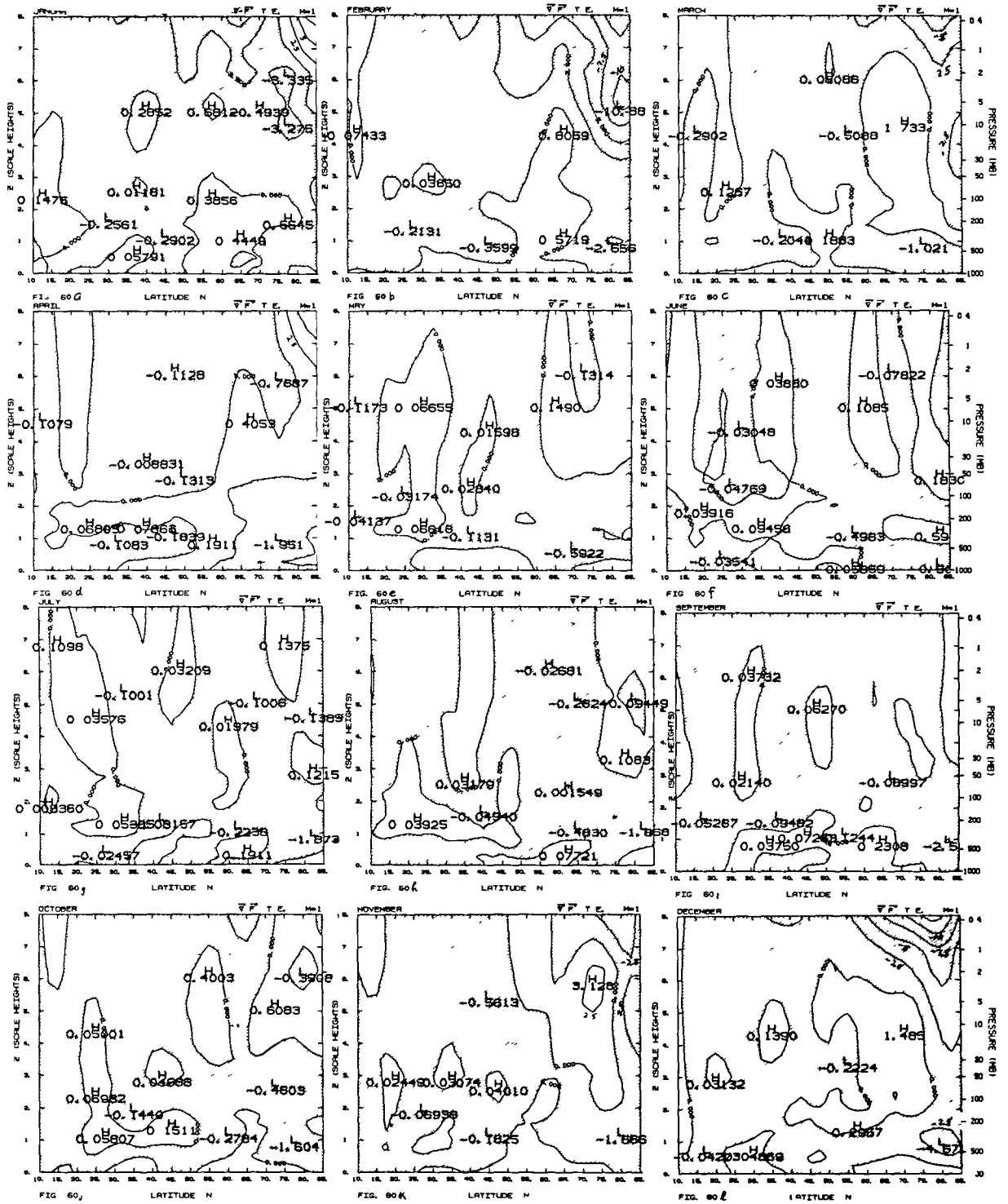


Fig 60. As in Figure 58, but for transient eddy fluxes.

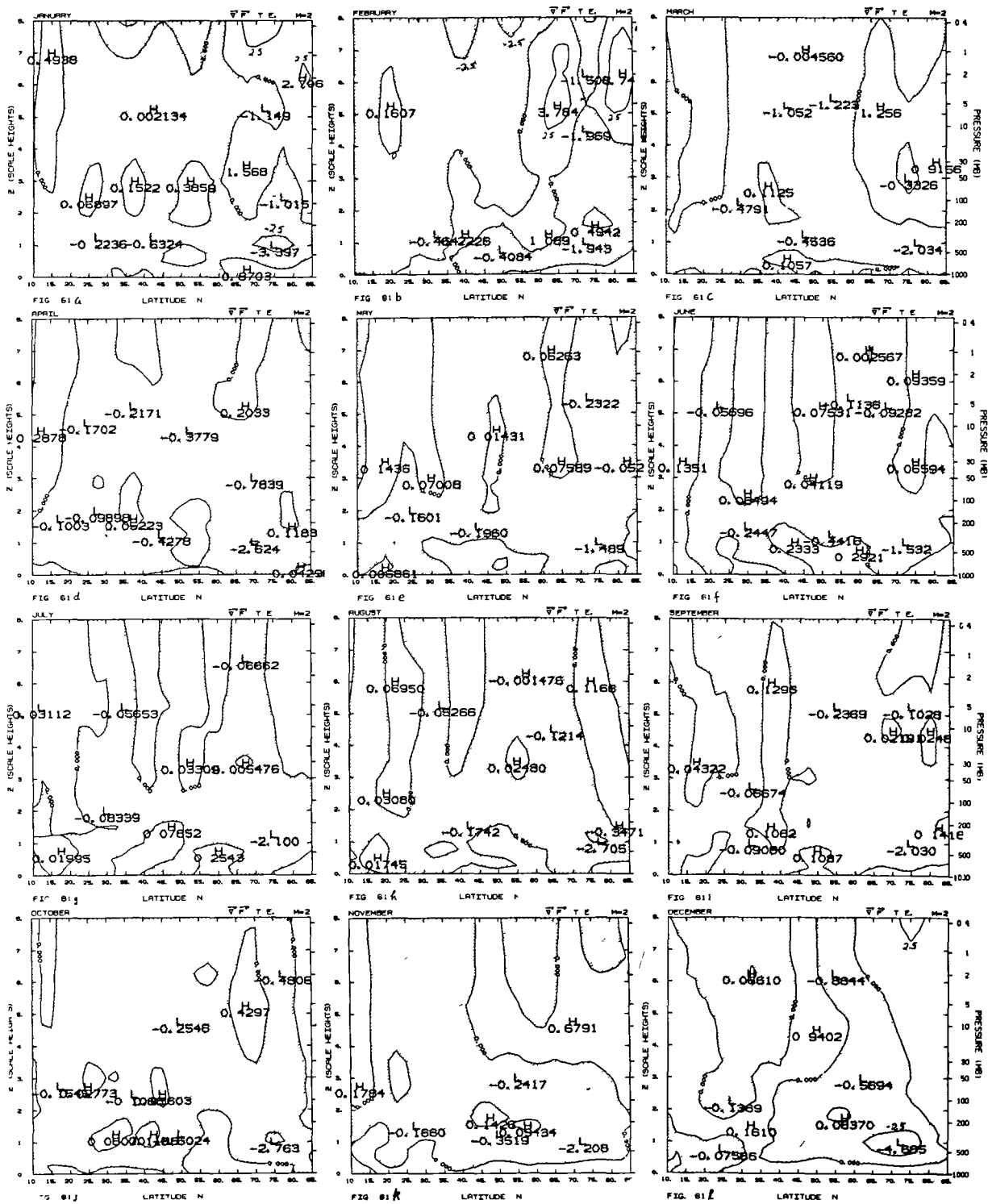


Fig 61. As in Figure 58, but for transient eddy zonal wavenumber two.

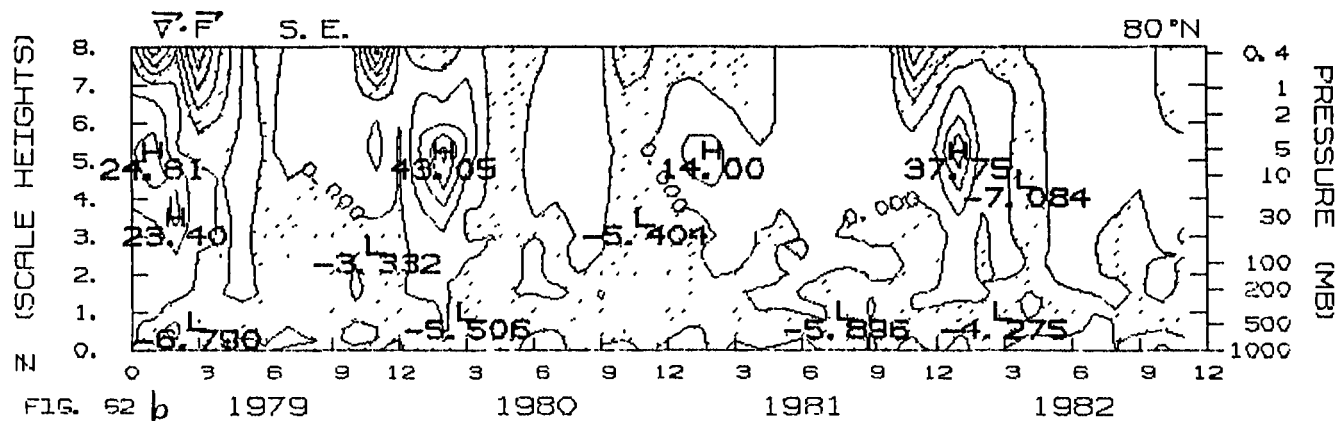
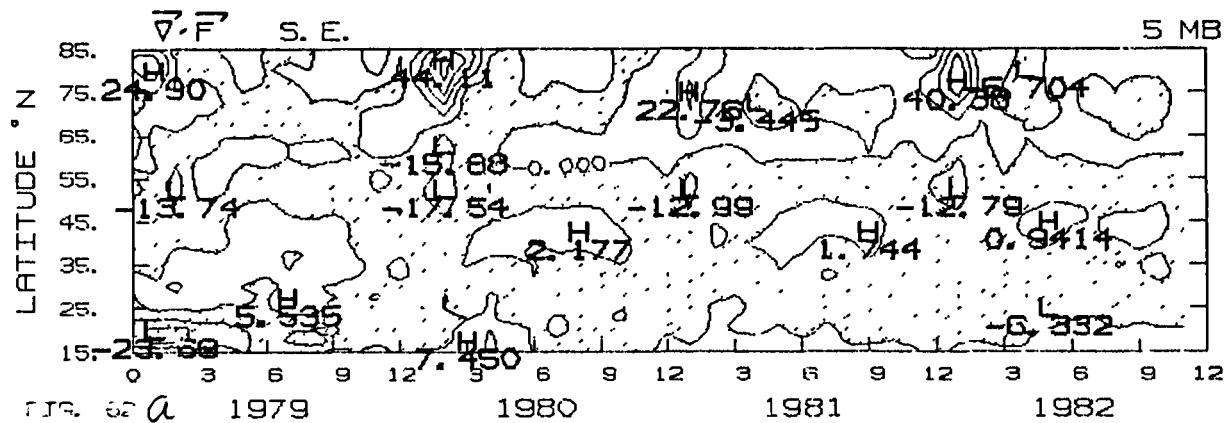


Fig 62. Eliassen-Palm flux divergences (10^{-5} m/sec^2) resulting from the standing eddies, (a) time-latitude section at 5 mb, (b) time-height section at 80°N .

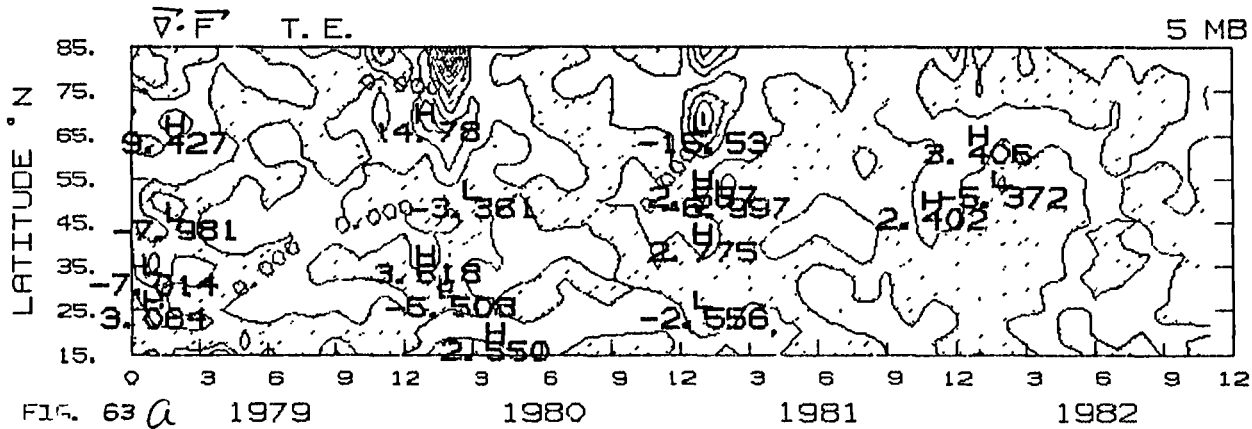


FIG. 63 a 1979

1980

1981

1982

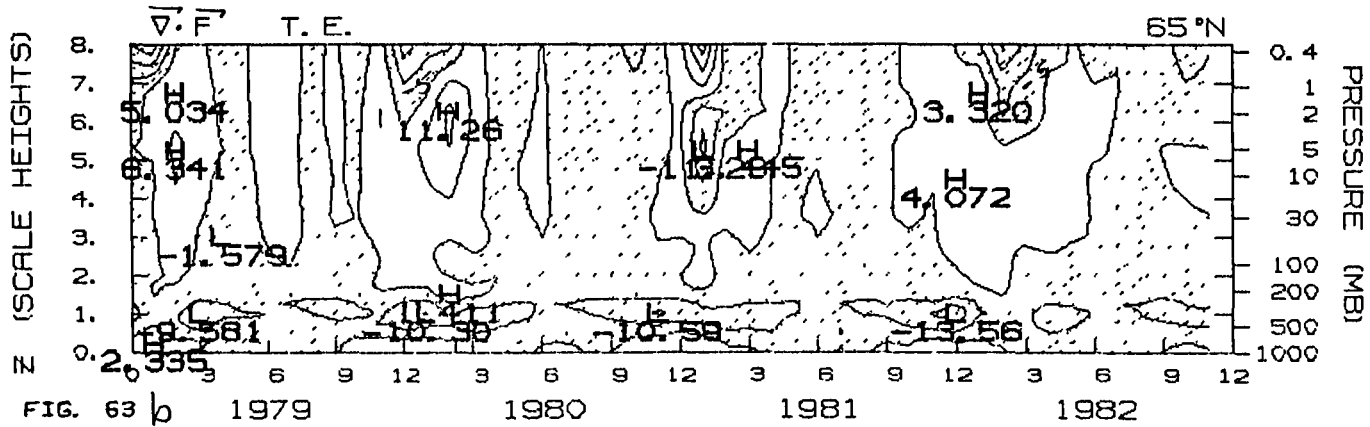


FIG. 63 b 1979

1980

1981

1982

Fig 63. As in Fig. 62, but for transient eddies, (a) time-latitude section at 5 mb, (b) time-height section at 65°N.

7. APPENDIX
TABLES

TABLE 1a ZONAL MEAN TEMPERATURE ($^{\circ}$ K) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JANUARY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	0	10	20	30	40	50	60	70	80	90
0.4	258.0	259.4	259.2	259.0	260.0	259.8	259.8	260.3	260.0	260.7
1	266.4	266.2	264.6	261.4	257.3	254.9	255.2	257.0	258.1	257.9
2	262.0	261.5	260.1	256.5	251.4	247.1	245.2	244.6	243.8	242.4
5	243.4	243.0	242.3	240.3	237.2	233.1	229.2	225.3	222.3	219.7
10	230.8	230.8	230.3	229.2	227.1	222.9	217.8	212.7	208.4	205.9
30	216.6	216.6	216.7	217.3	218.3	216.7	211.4	204.6	199.6	197.8
50	207.2	207.2	208.0	211.2	215.0	216.6	211.7	204.7	199.8	198.5
70	198.1	198.0	199.3	206.7	214.9	216.9	212.6	206.3	201.8	200.4
100	196.4	196.7	199.7	208.0	215.9	217.6	213.9	208.9	205.4	204.0
150	207.3	207.7	209.3	213.3	217.6	218.0	214.9	211.1	208.5	207.0
200	220.5	220.6	220.3	219.2	218.0	216.9	214.3	211.5	209.8	208.2
250	232.0	231.8	230.2	225.6	220.0	217.4	214.9	212.6	211.3	210.0
300	241.8	241.4	238.9	232.8	225.2	221.2	218.3	216.0	214.4	213.4
400	257.0	256.6	253.5	246.1	237.7	232.6	229.1	226.4	223.9	222.7
500	267.9	267.7	264.7	257.4	248.9	243.0	239.0	236.0	233.2	231.8
700	283.2	283.0	280.2	273.0	264.7	258.0	253.7	250.1	246.6	245.3
850	292.2	291.7	288.4	280.8	272.7	263.8	258.9	255.0	251.1	249.4
1000	299.6	299.0	295.2	287.5	279.2	267.1	260.9	255.6	250.6	247.6

TABLE 1b ZONAL MEAN TEMPERATURE ($^{\circ}$ K) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE FEBRUARY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	0	10	20	30	40	50	60	70	80	90
0.4	259.6	260.1	260.2	260.5	260.1	259.3	259.4	261.1	263.0	264.6
1	268.3	267.9	266.0	262.5	257.8	254.1	253.2	254.7	256.1	256.7
2	265.3	264.6	262.3	258.0	252.0	246.7	244.8	246.0	247.8	248.4
5	245.8	245.4	244.1	241.2	237.3	233.9	232.3	232.4	233.4	233.3
10	231.3	231.3	230.7	228.8	226.8	226.1	225.7	224.9	222.6	220.1
30	215.7	215.7	215.9	216.6	218.3	219.3	218.0	215.0	211.7	209.5
50	206.2	206.1	207.1	210.7	216.0	218.6	217.0	213.2	209.0	206.8
70	197.7	197.6	198.8	206.5	215.1	218.5	216.8	212.9	208.8	206.7
100	196.7	196.9	199.5	208.0	216.4	219.1	217.3	213.8	210.5	208.6
150	207.7	207.9	209.5	213.5	218.1	219.4	217.4	214.4	211.8	209.5
200	220.8	220.7	220.6	219.3	218.1	218.0	216.1	213.8	212.3	209.7
250	232.2	232.0	230.5	225.6	219.9	217.9	215.9	213.9	212.9	210.5
300	241.9	241.5	239.1	232.6	225.0	221.3	218.7	216.5	214.9	213.2
400	257.1	256.6	253.5	246.0	237.7	232.6	229.2	226.4	223.7	222.6
500	268.0	267.7	264.6	257.4	248.9	243.0	239.1	236.0	233.2	231.4
700	283.3	283.0	280.5	273.0	264.7	258.0	253.7	250.1	246.6	245.7
850	292.4	291.9	288.8	280.8	272.7	264.4	259.5	254.5	249.7	248.0
1000	299.8	299.0	295.5	287.9	279.9	268.4	262.0	255.1	249.9	246.6

TABLE 1c ZONAL MEAN TEMPERATURE ($^{\circ}$ K) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MARCH

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	0	10	20	30	40	50	60	70	80	90
0.4	260.8	261.2	261.0	261.5	262.0	261.0	260.1	260.3	260.5	260.2
1	268.9	268.3	266.7	264.6	261.8	258.7	256.0	254.7	253.4	251.3
2	268.9	267.5	264.4	260.9	256.2	250.6	246.2	243.8	241.4	238.2
5	250.7	249.8	247.2	244.3	240.0	235.1	231.8	230.1	228.6	226.3
10	234.2	234.2	233.6	231.5	227.6	224.5	223.8	224.6	224.4	223.6
30	216.9	216.8	217.1	217.3	217.6	218.4	219.0	219.0	218.5	218.1
50	206.7	206.6	207.7	210.9	215.2	218.2	219.1	218.4	217.1	216.2
70	198.3	198.1	199.3	206.3	214.2	218.5	219.4	218.4	216.7	215.5
100	196.9	197.2	199.7	207.7	215.5	219.3	220.0	219.0	217.4	216.5
150	207.8	208.0	209.3	213.1	217.2	219.7	220.1	219.1	217.3	215.9
200	220.9	220.9	220.4	218.7	217.4	218.4	218.8	218.1	216.5	214.8
250	232.3	232.2	230.4	225.2	219.8	218.4	217.9	217.1	215.8	214.1
300	241.9	241.7	239.1	232.7	225.7	222.0	219.8	218.2	216.8	215.4
400	257.1	256.7	253.6	246.6	239.0	233.7	229.9	227.1	225.2	224.6
500	268.1	267.8	264.9	258.4	250.4	244.3	239.8	236.4	234.3	233.8
700	283.6	283.5	281.3	274.5	266.7	253.7	254.5	250.5	248.0	247.8
850	292.7	292.6	289.4	282.4	275.1	267.2	261.5	255.7	252.4	252.3
1000	300.2	299.7	297.3	289.6	282.7	272.7	265.7	256.6	252.0	251.0

TABLE 1d ZONAL MEAN TEMPERATURE ($^{\circ}$ K) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE APRIL

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	0	10	20	30	40	50	60	70	80	90
0.4	260.5	261.0	261.2	262.3	264.2	265.2	265.4	265.3	264.9	265.0
1	268.0	267.7	266.7	266.3	266.7	266.9	265.7	263.9	261.6	260.0
2	268.4	267.0	264.6	262.9	261.9	260.2	257.4	254.5	251.4	248.6
5	251.5	250.3	248.3	246.5	244.6	242.2	240.2	238.9	237.4	235.1
10	235.7	235.7	235.3	233.8	230.5	227.4	227.2	228.6	230.3	230.2
30	218.4	218.3	218.7	218.8	218.7	218.9	220.1	222.2	224.1	224.4
50	207.8	207.7	209.0	211.6	215.2	218.1	220.2	222.3	223.8	223.9
70	198.7	198.5	200.1	206.6	213.7	218.0	220.4	222.6	223.9	223.6
100	196.7	197.2	200.5	207.7	214.9	219.1	221.3	223.3	224.5	224.2
150	208.0	208.2	209.5	212.2	216.1	219.4	221.6	223.6	224.4	222.8
200	221.3	221.1	220.1	217.8	217.1	218.5	220.4	222.6	223.4	221.2
250	232.9	232.6	230.3	225.4	221.2	219.8	219.8	221.1	221.9	220.2
300	242.5	242.2	239.2	233.9	228.2	224.5	222.3	221.5	221.2	220.6
400	257.6	257.2	254.2	248.8	242.4	237.1	233.2	229.5	227.5	226.3
500	268.6	268.3	265.7	260.8	253.9	248.1	243.5	239.3	236.2	236.7
700	284.0	284.0	282.5	277.6	270.5	263.6	258.4	253.3	249.5	249.4
850	293.3	293.6	292.1	285.8	278.9	272.1	266.4	259.7	254.6	253.3
1000	300.3	300.6	299.3	292.5	286.3	278.5	272.2	262.0	254.1	250.4

TABLE 1e ZONAL MEAN TEMPERATURE ($^{\circ}$ K) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MAY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	0	10	20	30	40	50	60	70	80	90
0.4	259.7	260.5	261.3	263.2	266.0	268.4	269.7	270.4	271.0	271.3
1	266.3	266.3	266.3	267.4	269.6	271.6	273.1	274.6	275.8	275.7
2	266.2	265.3	264.1	264.4	266.0	267.0	267.0	266.9	266.9	265.8
5	250.2	249.3	248.2	248.2	248.9	249.1	248.9	248.7	248.8	247.7
10	236.0	235.9	235.6	235.1	234.0	233.4	233.8	235.4	236.5	236.2
30	219.3	219.3	219.8	220.4	220.7	221.4	223.3	226.0	228.2	228.7
50	209.0	208.9	210.1	212.7	216.1	219.6	222.6	225.7	227.7	227.8
70	199.8	199.7	201.4	207.0	213.8	218.9	222.5	225.6	227.5	227.1
100	197.6	197.8	200.6	207.0	214.6	220.0	223.4	226.3	228.1	228.3
150	208.3	208.2	209.3	211.8	216.0	220.5	223.7	226.6	228.1	227.3
200	221.5	221.3	220.6	218.9	218.0	219.9	222.3	225.4	227.3	226.0
250	233.0	232.9	231.3	227.6	223.4	221.9	221.9	223.6	225.6	224.7
300	242.6	242.5	240.5	236.3	231.2	227.3	224.9	224.2	224.6	224.3
400	257.6	257.5	255.4	251.3	245.8	240.7	236.9	234.0	231.7	231.7
500	268.5	268.5	266.8	263.2	257.5	251.9	247.8	244.2	241.2	241.3
700	283.9	284.3	283.6	280.2	274.8	268.2	263.7	259.3	255.6	254.6
850	293.0	293.9	293.6	289.0	283.7	277.5	272.6	266.3	261.6	261.8
1000	300.3	301.1	300.9	295.6	290.5	284.5	279.3	269.9	263.2	262.6

TABLE 1f ZONAL MEAN TEMPERATURE ($^{\circ}$ K) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JUNE

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	0	10	20	30	40	50	60	70	80	90
0.4	258.4	259.4	260.7	263.2	266.4	269.8	272.6	274.7	276.4	277.2
1	264.4	264.4	265.0	266.8	270.1	273.5	276.6	280.0	282.7	283.6
2	263.7	263.1	262.7	264.1	266.9	269.6	271.8	274.1	275.8	275.8
5	248.3	247.6	247.2	248.3	250.3	252.3	254.1	255.5	256.6	256.1
10	235.4	235.4	235.2	235.4	236.0	237.1	238.7	241.1	242.6	242.7
30	219.9	219.9	220.3	221.2	222.3	223.9	226.3	229.3	231.5	231.1

TABLE 1g ZONAL MEAN TEMPERATURE (°K) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JULY

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	90
0.4	257.8	258.8	260.3	262.6	265.4	269.8	272.1	274.4	276.1	277.1
1	263.7	263.6	263.6	264.9	268.1	272.0	275.7	279.3	282.3	283.4
2	262.0	261.4	260.9	261.8	264.5	267.8	270.9	273.6	275.7	276.0
5	246.3	245.8	245.6	246.7	248.8	251.4	253.8	255.6	256.8	256.6
10	234.8	234.8	234.7	234.9	235.8	237.5	239.7	242.0	243.3	243.5
30	220.2	220.1	220.4	221.2	222.7	224.7	227.2	229.8	231.7	232.4
50	211.7	211.6	212.1	213.7	217.1	221.4	225.2	228.5	231.0	231.4
70	203.8	203.8	204.4	206.9	212.8	219.6	224.5	228.0	230.5	230.6
100	202.1	202.0	203.1	205.8	212.5	220.5	225.4	228.5	231.0	231.8
150	209.4	209.1	210.2	212.4	216.5	221.7	225.6	228.3	230.8	231.6
200	221.0	220.9	221.8	222.8	223.1	222.7	224.2	226.7	229.4	231.0
250	231.7	232.2	232.8	232.9	230.7	226.7	225.2	225.8	228.0	230.2
300	241.1	241.8	242.1	241.8	238.7	233.7	230.7	229.3	229.3	230.6
400	256.1	256.6	256.7	256.1	252.8	248.2	244.6	242.1	239.8	239.1
500	267.0	267.4	267.5	267.0	264.1	259.6	256.0	253.2	250.5	249.3
700	282.0	283.0	283.7	283.5	281.0	275.4	271.7	268.7	265.5	263.9
850	291.4	292.9	294.7	294.1	291.5	285.5	281.5	277.0	272.6	271.4
1000	297.9	300.1	301.9	301.1	299.2	291.8	288.2	281.5	275.0	273.1

TABLE 1h ZONAL MEAN TEMPERATURE (°K) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE AUGUST

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	90
0.4	257.7	258.8	259.8	261.4	263.6	266.3	268.8	270.2	271.2	272.2
1	264.8	264.6	263.5	263.3	265.2	268.1	270.8	273.0	274.9	275.9
2	263.0	262.2	260.5	259.7	260.9	263.0	264.8	265.8	266.3	266.3
5	246.3	245.7	244.9	244.9	245.9	247.4	248.6	249.0	248.9	248.5
10	234.2	234.2	233.9	233.8	234.2	235.2	236.3	237.4	238.1	237.7
30	219.9	219.9	220.0	220.9	222.4	223.8	225.4	227.0	228.6	229.4
50	212.1	212.1	212.3	213.8	217.0	220.8	224.0	226.4	228.3	228.7
70	204.5	204.5	205.1	207.5	212.8	219.2	223.8	226.5	228.4	228.5
100	202.3	202.0	202.7	205.7	211.7	219.4	224.1	226.5	228.9	229.5
150	209.1	208.8	209.7	212.0	215.6	220.5	224.4	226.2	228.7	229.3
200	220.6	220.7	221.5	222.3	222.3	222.0	223.3	224.2	227.3	228.4
250	231.6	232.1	232.8	232.5	230.2	226.0	224.2	223.5	225.9	227.4
300	241.2	241.9	242.4	241.7	238.6	233.3	229.6	227.7	227.4	228.1
400	256.5	257.0	257.2	256.3	253.1	249.0	243.5	240.9	237.9	237.0
500	267.5	268.0	268.1	267.4	264.5	259.5	254.9	252.2	248.7	247.3
700	282.8	283.7	284.4	283.8	281.2	275.3	270.6	267.8	263.5	261.9
850	291.5	293.2	295.1	294.1	291.3	284.8	279.8	275.7	270.5	269.5
1000	297.3	300.2	302.0	301.2	298.6	291.6	286.6	280.0	273.4	273.0

TABLE 1i ZONAL MEAN TEMPERATURE (°K) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE SEPTEMBER

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	90
0.4	259.4	260.4	260.9	262.2	263.7	263.9	263.0	262.2	262.4	262.4
1	263.8	263.7	262.4	261.4	261.4	261.3	260.7	259.1	257.4	257.0
2	263.1	262.7	260.5	258.6	257.9	257.1	254.8	251.5	248.3	247.1
5	248.2	247.7	246.1	244.6	244.0	243.1	240.7	237.3	234.3	233.0
10	234.4	234.4	233.7	232.7	231.7	230.7	229.3	227.7	226.3	225.6
30	219.5	219.4	219.6	220.2	220.8	220.9	221.1	221.2	221.2	221.4
50	211.5	211.5	211.7	213.3	215.8	218.7	220.8	221.7	222.0	221.7
70	203.9	203.9	204.5	207.3	212.3	218.0	221.4	222.7	223.1	222.5
100	201.8	201.5	202.4	205.3	211.6	218.4	222.0	223.5	224.4	224.2
150	208.9	208.6	209.4	211.1	214.6	219.2	222.4	223.7	224.7	224.7
200	220.8	220.7	221.0	221.0	220.3	220.3	221.5	222.3	223.4	223.9
250	231.9	232.1	232.0	230.9	227.6	223.9	222.0	221.4	222.0	223.1
300	241.6	242.0	241.6	240.0	235.8	230.4	226.4	224.3	223.4	224.5
400	256.8	257.3	256.7	255.0	250.4	244.4	239.5	236.2	233.6	233.5
500	267.7	268.1	267.6	266.2	261.9	255.7	250.6	247.0	244.0	243.5
700	283.0	283.8	284.0	282.6	278.6	271.4	266.1	262.1	258.4	258.0
850	291.9	293.3	294.6	292.4	288.2	280.3	274.8	269.7	265.1	264.7
1000	297.9	300.3	302.1	301.8	295.7	287.2	281.6	274.7	268.6	268.1

TABLE 1j ZONAL MEAN TEMPERATURE (°K) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE OCTOBER

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	90
0.4	261.4	261.7	261.0	260.4	260.7	260.2	258.6	256.7	255.5	255.0
1	264.7	264.2	262.7	261.0	258.7	255.0	251.3	247.6	244.2	242.4
2	265.0	263.9	260.9	257.6	254.1	248.8	242.9	237.3	232.6	230.2
5	250.2	249.2	246.3	242.8	239.6	235.3	229.6	223.5	218.5	216.2
10	235.1	235.1	233.6	231.1	228.3	225.0	221.2	216.8	212.5	210.6
30	218.5	218.5	218.7	218.6	218.1	217.5	216.5	215.1	211.5	210.8
50	209.7	209.7	210.2	212.0	214.2	216.4	217.2	216.0	214.2	214.6
70	202.3	202.2	202.8	206.6	212.0	216.4	218.2	217.9	216.6	216.1
100	199.9	199.7	201.2	205.5	211.9	217.0	219.5	219.4	218.7	218.2
150	209.4	208.1	208.8	210.9	214.3	218.1	220.3	220.6	220.0	219.4
200	220.7	220.5	220.2	219.5	218.5	218.2	220.1	219.9	219.3	219.4
250	232.1	232.0	231.0	228.5	224.7	222.1	220.5	219.3	218.6	219.1
300	241.9	241.9	240.5	237.2	232.3	227.6	223.9	221.6	220.3	221.0
400	257.1	257.2	255.7	252.1	246.6	240.4	234.5	228.2	223.0	222.9
500	268.0	268.2	267.0	263.8	258.2	251.4	246.1	242.5	239.9	239.1
700	283.3	283.7	283.1	280.3	274.4	266.6	261.0	256.6	253.2	251.7
850	292.3	293.4	293.4	289.4	283.1	274.6	268.7	263.4	259.1	257.6
1000	297.8	300.1	300.5	296.3	290.0	280.4	274.1	267.0	261.2	259.5

TABLE 1k ZONAL MEAN TEMPERATURE (°K) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE NOVEMBER

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	90
0.4	262.6	262.6	261.3	259.7	258.5	256.7	254.8	253.8	253.6	253.3
1	264.3	263.8	262.4	259.7	254.6	249.1	246.7	245.9	245.4	245.0
2	264.9	263.8	260.9	256.1	248.9	240.7	235.5	232.7	230.6	229.2
5	250.8	249.8	246.6	241.6	234.8	227.2	220.9	216.3	212.8	210.9
10	235.9	235.9	234.1	230.4	225.1	219.1	213.8	209.9	207.0	205.8
30	218.6	218.5	218.5	217.7	216.3	214.6	212.1	208.5	205.1	204.0
50	209.0	209.0	209.5	210.9	213.2	214.6	213.8	210.9	207.7	206.4
70	200.8	200.7	201.3	205.7	211.7	215.2	215.3	213.1	210.4	209.3
100	198.6	198.8	200.7	205.7	212.4	216.4	217.1	215.4	213.5	213.2
150	207.8	207.6	208.5	211.0	214.8	217.4	218.1	217.1	215.4	215.0
200	220.6	220.3	219.7	218.7	217.7	217.6	217.7	216.9	215.4	214.8
250	232.1	231.9	230.3	227.0	222.4	219.6	218.1	216.6	215.4	214.9
300	242.0	241.8	239.7	235.3	229.0	224.4	221.0	218.5	217.1	216.8
400	257.3	257.1	254.9	249.8	242.6	236.4	231.6	228.2	226.1	225.6
500	268.2	268.1	266.4	261.5	254.0	247.1	241.8	237.9	235.4	234.7
700	283.3	283.6	282.1	277.5	269.9	262.3	256.8	252.0	248.7	247.5
850	292.2	293.1	291.3	285.4	277.9	269.3	263.4	257.7	253.7	252.4
1000	298.6	299.7	297.9	292.0	285.0	274.3	267.5	259.7	255.7	253.8

TABLE 1l ZONAL MEAN TEMPERATURE (°K) FOR NORTHERN HEMISPHERE 4-YEAR (1978-1981) AVERAGE DECEMBER

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	90
0.4	259.8	260.0	260.2	259.7	257.3	254.4	253.2	253.4	253.7	253.7
1	265.7	265.6	265.0	262.4	256.4	250.3	248.4	248.7	247.8	246.9
2	263.1	262.6	261.3	257.0	248.3	239.2	235.0	233.3	231.4	230.0
5	246.4	245.9	244.4	240.3	232.3	223.5	217.8	214.2	211.6	210.0
10	233.4	233.5	232.4	229.1	222.8	214.8	208.9	205.2	203.2	202.4
30	218.0	218.0	218.0	217.2	215.6	212.7	208.1	203.2	200.3	199.8
50	208.3	208.2	208.8	210.4	213.1	213.5	210.5	206.1	203.1	202.4
70										

TABLE 2 a ZONAL MEAN GEOSTROPHIC ZONAL WIND (M/SEC) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JANUARY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	6.3	11.7	29.3	40.4	50.0	56.3	54.0	43.6	29.4	20.6
1	9.4	11.6	25.7	34.8	45.3	54.8	55.6	45.6	29.8	20.3
2	6.1	6.6	17.2	24.4	36.9	51.4	56.0	46.5	29.0	19.2
5	0.8	2.3	8.5	12.8	25.9	43.6	51.6	43.1	25.3	15.8
10	-1.1	1.1	4.6	7.9	19.2	36.5	45.0	37.9	21.0	12.7
30	-1.5	0.9	2.6	7.4	14.5	25.9	31.4	26.7	13.8	8.7
50	-2.0	1.2	4.9	12.7	17.0	22.3	24.5	20.5	10.9	7.4
70	-2.8	1.4	9.5	21.3	21.2	20.7	20.2	16.5	9.2	6.8
100	-1.8	3.8	18.7	33.4	26.2	19.5	16.3	13.0	7.6	5.9
150	1.1	8.0	28.4	43.5	30.0	18.2	12.9	9.8	6.3	4.8
200	1.9	8.9	30.2	45.0	30.4	17.2	11.3	8.2	5.7	3.9
250	1.8	7.9	28.4	41.8	28.9	16.2	10.3	7.2	5.3	3.3
300	1.2	6.2	25.5	36.9	26.6	15.0	9.4	6.5	5.1	2.9
400	-0.7	2.2	19.1	28.0	21.8	12.7	7.8	5.2	4.3	2.4
500	-2.5	-0.9	13.4	20.9	17.5	10.5	6.4	4.0	3.3	1.9
700	-4.5	-4.5	4.6	10.7	10.4	6.7	3.9	2.0	1.8	1.2
850	-5.6	-6.6	-0.9	5.2	5.7	4.2	2.0	1.0	0.5	0.8
1000	-6.7	-8.9	-5.8	0.9	0.7	1.8	-0.5	0.5	-1.1	0.2

TABLE 2 b ZONAL MEAN GEOSTROPHIC ZONAL WIND (M/SEC) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE FEBRUARY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	19.6	27.9	38.8	49.3	44.0	33.0	25.2	19.6	21.0	16.3
1	20.4	23.4	33.1	42.7	37.1	29.8	26.7	22.9	23.3	18.1
2	12.9	14.4	22.8	30.8	25.8	24.9	27.0	25.3	24.7	18.7
5	3.5	4.1	10.6	16.3	14.1	18.2	26.4	27.6	26.2	19.0
10	0.7	1.0	5.0	9.0	8.9	16.0	25.3	27.6	24.5	17.3
30	-0.5	0.7	2.6	6.9	9.3	15.7	21.6	23.1	17.9	12.8
50	-1.4	0.9	5.6	12.7	13.8	15.7	18.8	19.5	14.7	10.8
70	-2.2	0.9	10.5	21.8	18.9	15.9	16.6	16.8	12.5	9.5
100	-1.5	2.7	19.5	34.3	24.6	16.1	14.5	14.1	10.6	8.2
150	0.9	6.6	28.9	44.7	28.9	16.2	12.3	11.4	9.0	6.5
200	1.3	7.6	30.8	46.1	29.5	16.0	11.1	9.9	8.1	5.1
250	0.8	6.8	29.0	42.5	28.1	15.4	10.4	9.1	7.6	3.9
300	0.1	5.3	26.0	37.4	26.0	14.5	9.7	8.5	7.2	3.2
400	-1.9	1.7	19.3	28.4	21.3	12.2	8.2	7.2	6.2	2.5
500	-3.6	-1.4	13.4	21.4	17.0	10.0	6.7	5.9	5.2	2.0
700	-5.7	-5.0	4.7	10.9	10.0	6.3	4.3	3.6	3.5	1.2
850	-6.6	-6.8	-0.6	5.1	5.6	3.9	2.3	2.2	2.0	0.8
1000	-7.3	-8.8	-5.5	0.7	1.1	1.6	-0.3	1.2	0.1	0.2

TABLE 2 c ZONAL MEAN GEOSTROPHIC ZONAL WIND (M/SEC) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MARCH

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	52.6	51.3	39.6	45.7	48.3	36.7	23.0	14.3	22.5	19.7
1	50.1	44.8	35.2	43.1	44.1	32.1	20.8	14.0	20.3	17.6
2	34.9	31.8	25.8	35.3	36.2	25.4	16.9	12.4	16.6	14.2
5	9.5	10.7	11.6	23.1	23.2	15.2	11.5	9.8	11.7	9.5
10	1.0	3.4	4.9	15.0	14.8	10.3	9.9	9.6	9.6	7.5
30	0.2	3.2	2.6	9.1	9.1	9.1	10.3	10.3	8.0	6.2
50	-0.6	3.5	5.6	13.1	12.3	10.6	10.5	9.6	7.1	5.6
70	-1.4	3.5	10.4	21.0	17.0	12.2	10.4	8.7	6.1	4.9
100	-0.8	5.0	19.0	32.5	22.7	14.0	10.3	7.6	5.2	4.2
150	1.1	7.9	28.0	41.9	27.4	15.9	10.3	6.4	4.1	3.2
200	1.6	8.2	29.6	42.4	28.5	16.9	10.4	5.7	3.2	2.2
250	1.5	7.1	27.4	38.6	27.6	17.1	10.5	5.3	2.5	1.3
300	1.1	5.5	23.9	33.8	25.5	16.4	10.2	4.9	1.9	0.7
400	-0.6	1.8	17.0	25.8	20.9	14.0	8.8	3.8	1.2	0.1
500	-2.7	-1.3	11.3	19.6	16.8	11.5	7.3	2.7	0.8	-0.1
700	-4.8	-5.0	3.5	10.1	10.0	7.1	4.5	0.6	0.1	-0.9
850	-5.0	-6.7	-1.1	4.4	6.0	4.3	2.3	-0.8	-0.5	-0.3
1000	-5.2	-8.0	-5.2	-0.1	2.2	1.8	-0.5	-2.1	-1.4	-0.3

TABLE 2 d ZONAL MEAN GEOSTROPHIC ZONAL WIND (M/SEC) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE APRIL

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	48.5	40.8	19.9	18.4	21.2	16.1	9.2	4.2	10.9	13.8
1	49.2	37.9	19.1	21.3	24.0	16.1	7.6	2.2	9.0	12.6
2	36.5	27.6	13.5	19.9	23.3	13.9	4.4	-1.1	5.8	10.0
5	10.9	8.4	3.4	15.3	19.0	9.0	0.1	-4.7	1.5	5.8
10	1.6	1.3	-1.2	10.3	13.1	6.0	-0.7	-4.1	0.5	4.1
30	1.0	1.4	-1.7	5.2	7.0	4.9	1.7	0.8	2.0	4.0
50	0.4	2.2	1.3	8.2	9.5	6.6	3.7	2.9	2.7	4.0
70	-0.5	2.5	6.2	15.0	13.9	8.5	5.2	4.2	3.0	3.9
100	-0.2	5.0	15.6	24.8	19.4	10.9	7.0	5.4	3.3	3.5
150	1.1	8.4	25.0	32.2	24.5	13.5	9.1	6.7	3.3	2.5
200	0.6	7.9	25.9	32.3	26.2	15.0	10.6	7.7	2.9	1.2
250	-0.3	5.9	22.9	29.1	25.6	15.3	11.5	8.4	2.5	0.2
300	-1.0	3.9	19.1	25.5	23.7	14.7	11.4	8.6	2.4	-0.3
400	-2.4	0.1	12.5	19.4	19.3	12.4	10.0	7.7	2.1	-0.3
500	-3.7	-2.6	7.6	14.7	15.2	10.1	8.1	6.1	1.7	0.1
700	-4.0	-5.5	1.7	7.3	8.7	5.9	4.9	3.1	1.1	0.4
850	-3.5	-6.0	-1.5	2.4	4.9	3.3	2.7	1.1	0.2	0.2
1000	-1.8	-5.6	-4.5	-1.8	1.7	0.9	0.3	-1.2	-1.2	-0.4

TABLE 2 e ZONAL MEAN GEOSTROPHIC ZONAL WIND (M/SEC) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MAY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	22.2	15.4	-8.0	-13.8	-8.4	-7.2	-11.0	-13.5	-1.6	5.6
1	29.8	18.0	-4.0	-6.9	-1.8	-3.6	-8.9	-11.4	-1.0	5.6
2	24.0	13.3	-4.3	-3.5	2.0	-1.9	-8.1	-10.3	-1.0	4.7
5	8.0	1.5	-7.3	-0.8	4.7	-1.6	-8.6	-10.1	-1.9	2.7
10	1.7	-3.3	-9.2	-0.9	4.2	-1.7	-8.1	-8.8	-2.2	1.7
30	1.2	-3.3	-8.0	-1.6	2.8	-0.4	-4.3	-3.9	-0.9	1.8
50	0.5	-2.6	-4.3	1.6	5.6	2.1	-1.4	-1.2	0.1	1.9
70	-0.4	-2.2	0.4	7.7	10.2	4.8	0.9	0.6	0.5	1.8
100	-0.3	0.1	8.5	16.9	16.3	8.2	3.3	2.4	1.0	1.6
150	-0.2	3.2	16.3	24.3	22.3	12.1	6.0	4.5	1.4	1.1
200	-1.4	2.9	17.2	24.7	24.2	14.3	7.9	6.1	1.4	0.2
250	-2.3	1.8	15.1	22.0	23.4	14.9	8.8	7.3	1.5	-0.5
300	-2.7	0.5	12.3	19.0	21.4	14.2	8.6	7.8	1.6	-0.9
400	-3.2	-1.8	7.5	14.0	17.3	11.8	7.2	7.2	1.3	-1.0
500	-3.7	-3.5	4.0	10.3	13.6	9.5	5.6	5.8	0.8	-0.9
700	3.1	-4.6	0.2	4.8	7.8	5.5	3.0	3.0	0.1	-0.7
850	-1.0	-3.7	-1.8	1.3	4.6	3.0	1.3	0.7	-0.2	-0.6
1000	1.4	-2.2	-3.8	-1.9	1.9	1.0	-0.4	-2.1	-0.7	-0.6

TABLE 2 f ZONAL MEAN GEOSTROPHIC ZONAL WIND (M/SEC) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JUNE

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	5.6	-3.9	-26.9	-37.4	-28.4	-25.1	-27.1	-24.7	-10.0	-0.7
1	16.9	2.7	-20.1	-28.4	-19.5	-18.4	-21.8	-20.1	-7.4	0.5
2	14.2	1.5	-17.5	-22.4	-13.1	-14.1	-17.9	-16.6	-5.7	0.8
5	3.4	-4.8	-16.2	-15.8	-6.7	-9.6	-14.2	-13.5	-4.6	0.2
10	-1.1	-7.3	-16.0	-12.9	-4.2	-7.0	-11.7	-11.1	-4.0	-0.1
30	-1.8	-7.5	-14.1	-9.9	1.4	-2.8	-6.4	-5.5	-2.2	0.6
50	-2.4	-7.2	-11.1	-6.4	2.4	0.5	-3.1	-2.6	-1.0	1.0
70	-3.0	-7.0	-7.9	-1.3	7.6	3.9	-0.5	-0.5	-0.2	1.0
100	-3.5	-5.6	-2.7	5.7	15.1	8.1	2.2	1.5	0.7	1.0
150	-4.8	-3.8	2.7	11.8	22.6	12.5	5.1	3.7	1.8	0.9
200	-6.1	-3.7	4.1	13.1	24.5	14.7	6.9	5.4	2.5	0.6
250	-6.0	-3.6	3.4	12.0	22.9	15.0	7.7	6.6	3.1	0.8
300	-5.0	-3.5	2.2	10.3	20.5	14.2	7.5	7.1	3.5	0.9
400	-3.7	-3.5	-0.1	7.2	16.1	11.9	6.2	6.4	3.2	1.0
500	-3.5	-3.8	-1.7	4.9	12.7	9.8	5.0	5.3	2.6	0.8
700	-2.0	-3.1	-2.9	1.8	7.3	6.2	3.0	3.1	1.4	0.3
850	0.8	-1.0	-3.1	-0.0	4.2	3.9	1.7	1.2	0.6	0.0
1000	3.7	0.9	-3.0	-1.9	1.5	1.9	0.4	-1.3	-0.0	-0.2

TABLE 2₁ ZONAL MEAN GEOSTROPHIC ZONAL WIND (M/SEC) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JULY

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-1.0	-9.2	-27.4	-40.6	-37.2	-30.7	-29.5	-23.7	-10.9	-2.3
1	9.6	-3.6	-22.1	-32.6	-28.6	-22.9	-23.4	-19.0	-8.0	-0.7
2	6.2	-6.1	-21.3	-27.7	-21.7	-17.4	-18.8	-15.0	-5.8	0.0
5	-2.9	-10.9	-20.5	-21.9	-14.7	-11.2	-14.1	-11.5	-4.3	0.0
10	-6.3	-12.4	-20.0	-19.1	-11.2	-7.5	-10.9	-9.1	-3.6	-0.0
30	-7.1	-12.7	-18.5	-15.8	-6.3	-2.6	-5.4	-4.3	-1.8	0.8
50	-7.6	-12.6	-16.7	-12.4	-2.1	1.0	-2.1	-1.7	-0.6	1.2
70	-7.9	-12.4	-14.9	-8.4	3.2	4.8	0.5	0.3	0.2	1.2
100	-8.2	-11.5	-11.7	-3.2	10.7	9.8	3.4	2.2	1.3	1.4
150	-9.6	-10.5	-7.2	1.7	18.0	15.1	8.5	4.2	2.9	1.9
200	-10.6	-9.7	-5.0	3.5	19.8	17.0	8.1	5.7	4.1	2.4
250	-9.9	-8.5	-4.0	3.6	18.5	16.4	8.5	6.8	5.2	3.1
300	-8.1	-7.2	-3.8	3.0	16.3	15.0	8.0	7.0	5.8	3.7
400	-5.5	-5.6	-3.9	1.7	12.4	12.3	6.4	6.1	5.6	4.0
500	-4.5	-4.7	-4.2	0.8	9.6	10.2	5.1	5.0	4.8	3.6
700	-1.8	-2.5	-4.2	-0.4	5.4	6.6	3.1	3.0	3.2	2.8
850	1.7	0.3	-3.7	-1.2	3.0	4.1	2.0	1.3	2.3	2.4
1000	5.5	2.8	-2.8	-2.2	1.0	1.8	1.2	-1.2	1.5	1.9

TABLE 2₂ ZONAL MEAN GEOSTROPHIC ZONAL WIND (M/SEC) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE AUGUST

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	6.3	7.1	-5.6	-24.3	-24.3	-17.9	-19.3	-9.9	-4.1	0.3
1	15.2	8.1	-5.1	-19.9	-17.6	-11.9	-10.2	-7.2	-2.1	1.8
2	8.9	0.8	-9.6	-18.8	-13.2	-8.0	-7.5	-5.3	-0.9	2.3
5	-2.6	-8.7	-14.7	-17.8	-9.0	-4.2	-5.5	-4.6	-0.9	2.0
10	-6.4	-11.3	-18.6	-16.9	-7.1	-2.0	-4.2	-3.7	-1.2	1.4
30	-7.6	-11.7	-16.4	-14.0	-3.8	1.1	-1.3	-0.4	-0.2	1.6
50	-8.1	-11.7	-15.0	-10.7	-0.1	4.0	1.0	1.5	0.9	2.1
70	-8.4	-11.5	-13.3	-6.9	4.5	7.6	3.2	2.9	1.6	2.2
100	-9.2	-11.1	-10.0	-2.1	11.3	12.6	5.7	4.3	2.6	2.3
150	-11.1	-10.9	-5.5	2.4	18.0	18.0	8.2	5.9	4.3	2.5
200	-11.9	-10.5	-3.3	4.0	19.6	19.4	9.4	7.0	5.7	2.8
250	-11.1	-9.2	-2.7	4.0	18.2	19.2	9.4	7.6	6.9	3.2
300	-9.4	-7.7	-2.6	3.4	15.9	17.5	8.7	7.6	7.4	3.5
400	-6.7	-5.6	-3.0	2.0	12.1	14.3	6.8	6.6	6.9	3.6
500	-5.4	-4.4	-3.4	0.9	9.2	11.7	5.3	5.4	5.7	3.2
700	-2.4	-2.1	-3.6	-0.6	5.0	7.4	3.1	3.3	3.6	2.4
850	1.3	0.8	-3.1	-1.7	2.6	4.5	1.8	1.5	2.5	2.0
1000	6.5	3.8	-2.2	-3.0	0.5	1.8	0.7	-0.9	1.7	1.9

TABLE 2₃ ZONAL MEAN GEOSTROPHIC ZONAL WIND (M/SEC) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE SEPTEMBER

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	4.1	19.8	15.7	1.3	5.2	15.4	20.7	21.4	13.7	5.6
1	12.3	17.9	12.5	1.9	7.6	16.0	19.2	18.9	12.3	5.6
2	8.5	9.6	5.7	-0.3	7.4	14.5	16.4	15.4	10.0	4.8
5	0.2	-2.8	-4.1	-4.1	6.4	11.0	10.7	9.6	6.1	3.0
10	-3.3	-7.2	-9.2	-6.6	5.1	8.8	7.3	6.5	3.8	1.8
30	-4.3	-7.8	-10.7	-7.2	4.1	7.3	5.5	5.2	2.7	1.5
50	-4.9	-7.9	-9.1	-4.6	6.4	8.7	6.4	5.4	2.7	1.5
70	-5.2	-7.8	-7.1	-0.9	10.5	11.5	7.7	5.8	2.5	1.2
100	-6.0	-7.4	-3.7	4.2	17.1	15.5	9.4	6.4	2.6	0.9
150	-7.7	-7.1	0.2	8.9	23.5	20.0	11.3	7.1	3.1	0.7
200	-8.7	-6.9	1.4	10.1	24.8	21.9	12.3	7.6	3.6	0.7
250	-8.7	-6.4	1.1	9.4	23.1	21.5	12.2	7.9	4.1	1.0
300	-8.0	-5.7	0.3	8.1	20.6	20.0	11.4	7.6	4.4	1.4
400	-6.6	-5.0	-1.4	5.4	16.1	16.5	9.4	6.4	4.1	1.8
500	-6.0	-4.8	-2.7	3.3	12.5	13.5	7.5	5.0	3.4	1.8
700	-4.0	-3.7	-3.8	0.4	7.0	8.7	4.8	2.7	2.1	1.7
850	-0.4	-1.2	-4.0	-1.6	3.7	5.6	2.7	1.0	1.2	1.6
1000	5.7	2.1	-3.9	-3.7	0.9	2.8	1.0	-0.9	0.2	1.6

TABLE 2₄ ZONAL MEAN GEOSTROPHIC ZONAL WIND (M/SEC) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE OCTOBER

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	36.8	46.6	42.0	39.4	43.4	48.2	49.7	46.0	30.5	15.5
1	35.2	40.0	36.3	31.2	39.8	42.8	43.5	41.5	27.2	13.8
2	24.0	28.1	27.4	25.0	32.6	35.1	36.7	35.8	22.9	11.3
5	4.8	7.4	11.4	14.4	22.7	23.5	25.5	26.3	16.5	7.7
10	-2.1	-1.2	1.4	7.0	16.3	16.7	18.1	19.5	11.9	5.3
30	-2.4	-2.6	-4.1	1.1	10.5	11.6	11.3	12.0	6.7	3.1
50	-3.0	-2.6	2.2	2.8	11.7	12.1	10.3	9.7	5.3	2.6
70	-3.6	-2.6	0.3	7.3	15.3	13.8	10.5	8.8	4.5	2.3
100	-3.7	-1.7	4.8	14.2	20.8	16.7	11.2	8.1	4.0	2.0
150	-3.7	-0.6	9.6	20.1	26.1	20.2	12.1	7.7	3.6	1.7
200	-4.3	-1.1	10.4	21.1	27.3	21.9	12.5	7.4	3.5	1.7
250	-4.8	-1.6	9.1	19.4	26.0	21.8	12.3	7.2	3.4	1.7
300	-4.8	-2.1	7.2	17.0	23.8	20.6	11.4	6.7	3.4	1.9
400	-5.0	-3.3	3.5	12.5	19.4	17.2	9.4	5.4	3.1	2.1
500	-5.5	-4.5	0.8	9.0	15.5	14.1	7.6	4.0	2.6	2.0
700	-5.1	-5.2	-2.3	3.8	9.0	8.9	4.7	1.5	1.5	1.3
850	-2.4	-3.9	-3.8	0.4	5.0	5.7	2.6	-0.1	0.4	0.8
1000	3.1	-1.4	-5.2	-3.0	1.4	3.0	0.2	-1.4	-0.9	0.5

TABLE 2₅ ZONAL MEAN GEOSTROPHIC ZONAL WIND (M/SEC) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE NOVEMBER

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	42.0	46.8	61.6	72.9	82.5	89.0	49.2	38.7	22.2	12.6
1	37.3	39.6	53.2	64.5	73.9	82.2	47.0	37.6	21.5	12.0
2	26.6	29.9	42.8	52.8	59.7	53.2	43.7	35.6	20.1	11.0
5	7.0	10.4	23.8	33.6	39.9	39.1	35.3	30.1	16.3	8.4
10	0.2	1.8	11.3	20.6	27.0	27.7	28.2	25.3	13.1	6.5
30	0.3	0.4	2.9	8.9	15.9	18.0	19.4	17.7	8.7	4.4
50	-0.3	0.5	3.8	9.5	16.5	16.9	16.8	14.1	6.5	3.4
70	-0.9	0.5	6.3	14.5	19.9	17.7	15.7	12.0	5.2	2.8
100	-0.6	2.1	11.3	22.5	25.2	19.2	15.1	10.2	4.1	2.3
150	0.1	4.5	16.9	29.5	30.2	21.1	15.0	8.6	3.3	1.9
200	-1.1	4.0	17.5	30.5	31.2	21.7	15.1	7.7	2.7	1.5
250	-2.2	2.6	15.7	29.3	29.8	21.3	14.8	7.1	2.4	1.2
300	-2.7	1.0	13.1	25.0	27.4	20.1	14.1	6.4	2.1	1.0
400	-3.8	-1.8	8.2	18.7	22.4	17.0	12.1	5.1	1.6	0.8
500	-5.1	-3.7	4.4	13.5	17.9	14.1	10.1	3.8	1.2	0.7
700	-6.3	-6.0	-0.8	5.9	10.5	9.3	6.8	1.3	0.3	0.1
850	-4.8	-6.5	-4.1	1.4	6.0	6.5	4.4	-0.2	-0.6	-0.2
1000	-0.9	-6.1	-7.5	-2.4	1.7	4.1	1.3	-1.1	-1.9	-0.5

TABLE 2₆ ZONAL MEAN GEOSTROPHIC ZONAL WIND (M/SEC) FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE DECEMBER

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	8.0	6.9	39.9	79.7	109.5	80.1	51.7	34.7	19.9	13.1
1	11.4	8.7	36.5	70.7	91.8	73.3	51.4	35.0	18.8	12.3
2	9.0	7.6	29.6	57.6	75.5	64.6	49.6	33.9	16.7	10.9
5	1.9	2.8	17.6	37.3	50.9	49.6	43.4	30.0	13.1	8.5
10	-0.6	0.4	9.6	23.9	34.4	38.2	36.9	26.3	10.8	7.1
30	0.2	0.6	3.6	11.8	19.3	24.4	25.7	19.1	8.0	5.9
50	-0.1	1.3	4.3	12.9	19.4	21.3	20.8	15.0	6.6	5.4
70	-0.7	1.8	7.6	18.8	22.6	20.6	18.2	12.6	5.7	5.0
100	1.2	4.7	15.2	28.3	27.4	20.7	16.0	10.4	4.9	4.5
150	4.6	9.0	22.8	36.5	31.6	21.2	14.3	8.4	4.3	3.8
200	4.4	8.5	23.6	37.7	32.5	21.2	13.5	7.4	4.0	3.1
250	3.1	6.5	21.5	35.1	31.0	20.6	12.9	6.7	3.9	2.5
300	1.8	4.2	18.6	31.2	28.5	19.3	12.1	6.1	3.7	2.1
400	-0.8	-0.0	13.0	23.8	23.5	16.4	10.2	4.9	3.1	1.6
500	-3.0	-3.0	8.3	17.6	18.9	13.5	8.5	3.8	2.5	1.3
700	-5.4	-6.2	1.8	8.4	11.6	8.8	5.5	1.7	1.3	0.7
850	-5.7	-7.7	-2.8	3.3	7.1	5.9	4.2	0.6	0.2	0.1
1000	-4.7	-9.1	-7.0	-0.6	2.6	3.2	0.3	0.1	-1.4	-0.7

TABLE 3a

AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 1 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JANUARY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	0	10	20	30	40	50	60	70	80	85
0.4	46.4	44.0	63.5	206.4	397.1	760.0	1021.0	895.4	531.9	295.0
1	37.3	39.5	75.0	189.9	340.0	736.7	1007.8	909.8	549.5	304.8
2	28.0	34.3	68.8	134.8	306.9	737.3	1015.5	939.3	576.3	320.4
5	10.4	23.1	51.2	77.3	269.5	676.5	930.5	804.5	553.6	309.8
10	6.0	17.0	33.7	42.2	218.2	536.5	762.7	758.9	477.9	287.2
30	6.0	14.9	17.7	22.9	97.2	248.3	419.3	461.9	301.3	170.4
50	6.0	16.8	14.2	24.4	56.0	146.5	277.6	322.6	223.4	130.0
70	8.0	18.7	25.7	35.0	58.9	111.7	202.9	244.2	181.8	108.6
100	6.2	24.3	49.9	47.5	82.2	108.9	143.2	177.9	146.1	89.8
150	6.3	31.8	69.9	53.5	113.5	130.0	107.5	126.4	116.5	79.8
200	5.8	31.8	68.4	50.3	131.8	146.3	102.3	104.9	103.2	67.5
250	4.9	27.9	57.5	48.8	138.8	153.0	100.9	93.0	95.1	65.1
300	3.9	22.8	44.6	45.4	135.7	150.0	96.0	85.2	88.9	64.0
400	2.4	13.6	23.3	44.5	118.0	130.8	80.3	70.7	79.5	61.2
500	2.4	7.7	11.9	40.9	97.7	109.1	64.3	56.8	72.2	56.8
700	3.8	7.4	8.0	30.3	68.1	79.0	43.5	35.1	60.4	46.7
850	4.3	7.4	9.0	24.0	57.0	70.5	36.6	29.8	53.0	39.2
1000	6.0	8.8	12.5	22.4	51.2	73.8	46.4	50.4	47.8	34.0

TABLE 3b

AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 1 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE FEBRUARY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	0	10	20	30	40	50	60	70	80	85
0.4	28.0	45.9	58.8	114.2	171.5	301.7	468.9	514.7	327.5	170.5
1	21.1	40.3	50.4	90.3	124.7	280.1	484.7	553.5	377.0	210.8
2	13.1	32.4	38.8	66.3	87.2	289.9	537.7	635.4	465.2	264.6
5	5.2	23.0	27.1	40.0	70.9	308.1	582.7	705.2	527.9	300.7
10	4.4	19.5	20.0	28.5	60.4	282.7	525.7	653.4	483.1	271.9
30	4.4	16.4	15.1	21.6	21.3	126.8	313.1	418.7	299.8	164.8
50	4.4	16.2	15.7	25.7	39.0	79.1	198.3	283.6	208.7	116.9
70	4.5	16.7	22.7	32.6	53.5	89.9	126.9	201.5	156.8	90.7
100	4.2	18.4	38.9	43.0	84.9	79.5	82.2	128.0	109.2	66.1
150	4.3	22.7	53.1	52.1	111.8	98.4	67.1	67.5	67.3	43.0
200	3.4	23.4	53.0	55.5	124.7	112.7	83.0	45.0	47.0	30.9
250	2.6	21.2	45.8	55.5	127.8	121.1	72.9	42.0	37.4	24.6
300	2.0	17.6	35.9	54.7	123.8	120.8	78.8	41.5	31.6	25.4
400	2.2	10.8	19.0	53.1	108.8	107.4	71.9	39.0	50.9	26.2
500	3.0	6.7	9.8	50.8	91.9	91.6	63.6	38.8	29.7	24.9
700	3.7	4.9	7.7	40.7	64.1	69.9	52.4	44.4	30.8	24.1
850	3.7	6.3	13.1	31.7	51.7	63.7	52.2	54.1	35.9	23.4
1000	5.3	10.2	20.2	26.5	47.0	64.7	65.6	77.2	44.6	21.9

TABLE 3c

AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 1 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MARCH

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	0	10	20	30	40	50	60	70	80	85
0.4	29.0	39.4	72.4	132.0	250.8	433.0	538.9	456.2	311.6	213.5
1	21.9	33.0	62.5	109.4	207.8	369.2	471.7	423.5	288.9	191.9
2	16.2	27.3	54.3	88.5	166.4	321.5	431.7	405.1	271.6	173.2
5	6.5	20.1	40.3	56.9	103.4	244.6	390.4	420.9	280.8	181.7
10	5.8	18.8	25.9	30.8	69.3	180.4	341.5	430.3	298.2	167.3
30	5.5	18.2	20.3	23.5	26.7	82.8	227.7	337.5	240.1	136.0
50	5.4	18.8	19.5	24.3	28.7	58.7	158.3	252.8	184.4	107.2
70	5.4	19.7	24.3	25.1	34.2	85.8	114.1	190.9	143.1	86.1
100	5.4	20.9	37.4	32.1	49.2	86.8	79.1	128.9	105.1	67.6
150	5.3	22.5	49.7	39.3	85.5	112.4	68.1	82.7	74.6	51.4
200	4.9	21.5	48.8	37.4	74.9	126.2	74.8	77.8	68.9	43.7
250	4.5	18.9	42.2	32.4	78.1	135.4	79.2	79.7	70.8	42.4
300	4.0	15.7	34.3	27.8	76.4	133.0	77.5	79.3	71.3	42.9
400	3.2	10.5	21.4	23.8	66.8	114.3	66.2	73.0	67.8	41.6
500	3.1	7.1	13.4	22.7	54.8	82.7	54.4	64.9	62.9	39.6
700	3.5	4.2	6.1	21.5	34.0	61.9	39.9	52.3	56.9	37.6
850	3.5	4.4	12.9	21.4	25.8	51.5	33.8	51.2	55.5	35.9
1000	4.5	10.9	26.5	24.9	21.7	49.0	38.0	67.3	59.4	32.0

TABLE 3d

AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 1 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE APRIL

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	0	10	20	30	40	50	60	70	80	85
0.4	11.0	33.4	38.5	46.6	98.6	179.9	238.9	267.2	260.3	156.4
1	9.6	28.7	31.5	35.8	76.8	130.0	188.4	221.4	220.4	135.1
2	9.6	24.0	24.5	34.7	55.9	107.7	170.1	186.9	181.2	115.2
5	4.2	15.7	20.8	41.8	46.2	91.8	158.3	158.3	133.6	87.5
10	4.3	16.4	20.8	29.7	40.1	76.9	141.8	174.0	147.7	92.8
30	4.3	15.1	21.8	23.8	27.5	55.4	103.6	159.6	143.1	87.2
50	4.3	15.8	25.9	29.1	20.8	60.0	95.1	141.2	122.4	75.1
70	4.4	17.4	35.8	41.4	21.1	84.0	95.0	108.0	103.1	63.8
100	4.5	19.5	48.8	57.1	21.8	72.3	97.9	91.8	82.7	51.1
150	4.4	20.4	55.9	64.6	25.9	87.8	108.2	78.6	63.2	37.6
200	4.1	17.9	50.7	60.5	29.6	102.1	115.8	72.2	52.3	29.6
250	3.5	14.4	41.9	52.5	30.7	111.5	120.4	69.8	47.0	25.4
300	3.1	11.8	33.6	45.0	30.1	113.2	117.7	67.3	45.2	24.2
400	2.8	7.8	21.6	33.5	28.3	103.3	101.1	58.6	41.1	21.8
500	3.0	6.2	14.6	26.5	26.7	88.6	82.7	49.0	34.9	18.7
700	3.0	5.9	5.0	22.2	19.3	62.5	54.2	34.3	28.7	19.7
850	3.2	7.0	15.1	26.5	11.9	48.3	38.4	29.5	32.0	22.2
1000	5.2	13.5	35.5	39.0	19.7	32.0	27.4	37.3	37.9	24.8

TABLE 3e

AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 1 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MAY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	0	10	20	30	40	50	60	70	80	85
0.4	30.9	41.0	80.0	82.8	102.2	92.7	72.1	75.1	83.9	59.5
1	23.8	33.3	47.7	64.7	82.9	68.2	51.6	62.7	70.1	56.5
2	15.8	25.7	37.0	49.8	67.9	44.0	28.7	49.2	71.3	51.5
5	6.0	18.5	29.8	51.7	59.9	25.9	28.2	35.3	58.8	42.4
10	4.9	15.1	24.2	42.8	40.5	12.5	23.7	30.5	48.1	33.3
30	4.8	11.9	19.0	25.3	33.0	32.2	28.2	27.9	27.7	17.7
50	4.8	12.0	20.9	33.1	38.0	43.6	38.4	25.5	23.7	14.2
70	4.8	13.5	32.9	52.0	45.2	52.8	44.8	28.2	22.2	13.9
100	4.8	16.1	52.2	76.8	49.0	60.8	53.6	28.7	22.8	16.1
150	4.5	17.3	61.7	88.1	42.3	71.1	62.9	31.1	25.4	19.3
200	3.8	14.8	55.4	78.8	37.7	82.8	69.8	35.4	29.2	22.8
250	3.2	11.3	45.0	83.4	38.5	91.2	71.8	39.8	33.6	26.6
300	2.7	8.2	35.3	49.2	39.3	83.8	69.2	41.9	36.9	29.5
400	1.9	4.7	22.1	27.3	38.8	88.4	59.5	40.5	38.2	31.5
500	1.8	5.0	16.3	12.5	36.9	79.6	50.2	36.7	36.4	30.7
700	3.1	7.8	9.1	11.5	27.2	60.6	35.5	29.3	31.8	27.5
850	4.7	11.0	19.4	25.9	21.7	45.0	27.8	27.7	29.4	25.0
1000	8.0	17.9	41.5	41.9	28.3	31.8	27.5	30.4	28.7	21.6

TABLE 3f

AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 1 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JUNE

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	0	10	20	30	40	50	60	70	80	85
0.4	30.9	44.2	50.3	78.1	101.3	88.5	51.5	46.9	56.0	47.3
1	23.7	34.3	37.4	60.4	80.3	59.2	35.5	37.3	52.0	44.5
2	15.1	23.8	26.8	44.6	64.8	43.1	27.7	32.4	48.1	42.1
5	6.1	13.5	32.8	48.8	54.4	11.8	41.9	36.7	43.7	39.0
10	6.2	11.5	28.4	40.0	38.9	28.1	29.8	29.4	38.5	35.1
30	6.2	10.6	14.3	20.9	40.0	30.3	32.4	28.2	28.5	22.0
50	6.2	10.5	16.3	33.9	48.9	45.1	46.4	33.9	20.2	12.9
70	8.1	12.8	33.2	59.1	61.1	55.5	55.8	37.4	20.5	11.6
100	5.6	16.1	57.1	91.3	69.6	63.0	63.8	39.7	23.6	12.8
150	5.1	17.3	68.6	105.7	59.1	67.2	72.3	42.4	29.3	20.4
200	5.2	14.3	57.8	92.4	44.8	72.2	79.3	44.3	38.5	28.3
250	4.5	10.1	43.7	70.1	36.3	74.8	80.7	45.9	48.2	34.9

TABLE 3g AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 1 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JULY

Table with 11 columns (PRESSURE (MB), LATITUDE (°N) 0-85) and 11 rows (0.4-1000 MB).

TABLE 3f AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 1 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE AUGUST

Table with 11 columns (PRESSURE (MB), LATITUDE (°N) 0-85) and 11 rows (0.4-1000 MB).

TABLE 3i AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 1 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE SEPTEMBER

Table with 11 columns (PRESSURE (MB), LATITUDE (°N) 0-85) and 11 rows (0.4-1000 MB).

TABLE 3j AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 1 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE OCTOBER

Table with 11 columns (PRESSURE (MB), LATITUDE (°N) 0-85) and 11 rows (0.4-1000 MB).

TABLE 3k AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 1 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE NOVEMBER

Table with 11 columns (PRESSURE (MB), LATITUDE (°N) 0-85) and 11 rows (0.4-1000 MB).

TABLE 3l AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 1 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1981) AVERAGE DECEMBER

Table with 11 columns (PRESSURE (MB), LATITUDE (°N) 0-85) and 11 rows (0.4-1000 MB).

TABLE 4 a AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 2 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JANUARY

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	19.5	15.4	32.7	85.3	189.8	251.6	241.1	199.7	96.9	33.8
1	15.8	12.8	27.7	72.3	159.5	210.7	231.5	211.3	105.8	36.3
2	12.4	11.9	26.5	68.1	143.7	194.0	249.7	236.0	116.4	39.2
5	5.6	12.9	26.2	85.0	128.9	195.1	299.8	280.1	134.9	44.7
10	5.6	13.4	26.4	55.3	106.1	195.7	312.8	288.2	138.8	46.2
30	5.6	12.7	19.1	36.9	75.4	179.5	293.5	251.6	120.3	40.7
50	5.5	10.6	13.0	28.4	64.8	163.3	260.4	217.9	102.6	34.7
70	5.5	8.4	12.7	25.6	60.8	154.3	239.2	189.2	88.2	29.8
100	6.1	10.0	24.0	31.3	58.9	147.1	204.8	162.0	74.3	24.9
150	7.7	15.4	33.8	38.7	58.9	141.1	178.8	139.1	63.4	21.0
200	8.0	16.8	35.5	36.4	82.5	139.5	160.9	128.4	58.7	18.9
250	7.3	15.4	33.8	29.3	67.2	138.5	150.8	122.3	55.1	17.1
300	6.1	13.1	30.2	22.8	69.8	134.1	141.4	115.9	50.9	15.2
400	4.2	8.9	21.5	16.8	66.1	116.9	119.6	99.5	42.3	12.5
500	3.1	6.2	14.2	14.4	58.1	96.8	96.9	81.4	34.7	10.1
700	3.3	5.3	8.0	12.5	44.3	63.5	56.9	47.6	22.8	6.5
850	4.2	7.6	7.1	11.7	43.9	58.3	39.8	28.2	18.5	5.9
1000	5.0	8.8	4.9	15.4	55.9	65.8	63.2	24.0	11.9	5.4

TABLE 4 b AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 2 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE FEBRUARY

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	20.3	16.8	37.1	42.1	73.8	141.3	128.4	108.6	59.5	21.5
1	18.2	17.8	35.7	43.3	59.5	127.8	130.8	134.9	67.4	23.4
2	11.9	19.7	36.1	47.6	63.5	127.9	176.7	177.7	82.3	26.8
5	5.7	21.4	37.2	55.2	79.9	138.4	230.5	234.5	106.3	33.7
10	4.5	19.8	30.5	49.2	77.8	136.7	251.7	250.1	112.8	36.2
30	4.5	13.5	17.9	35.1	55.2	139.4	249.1	226.9	107.7	36.1
50	4.5	9.9	14.9	33.0	46.9	133.8	232.9	212.5	101.5	34.0
70	4.5	7.4	16.3	32.4	43.0	130.5	217.9	199.5	94.0	31.4
100	4.9	7.6	25.6	38.5	41.9	130.1	203.8	186.0	85.7	28.4
150	6.0	11.7	31.5	45.7	42.8	131.6	191.2	173.2	78.0	25.4
200	6.3	13.0	30.8	44.3	46.8	134.4	184.7	166.7	73.9	23.8
250	5.7	12.4	28.2	38.6	53.9	136.2	180.0	162.8	71.2	22.7
300	4.8	11.0	25.0	33.2	59.0	133.2	172.2	157.0	68.0	21.5
400	3.6	8.3	19.3	26.1	58.4	117.0	148.7	138.7	59.4	19.0
500	3.0	6.6	15.5	21.4	51.2	97.4	122.9	117.3	49.9	16.5
700	3.3	6.7	12.0	15.3	37.0	65.0	77.9	74.9	31.6	11.5
850	4.0	7.8	9.9	14.3	36.6	57.5	54.2	42.9	19.0	7.7
1000	4.3	7.5	10.8	17.1	44.8	75.7	59.1	20.4	10.3	5.8

TABLE 4 c AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 2 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MARCH

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	21.2	13.9	30.8	55.5	52.1	69.5	86.2	87.8	59.0	27.1
1	18.4	13.5	28.3	50.8	40.8	81.4	90.1	85.9	56.9	24.7
2	15.4	13.4	27.6	47.6	34.6	67.6	115.0	100.8	58.1	23.2
5	7.4	13.4	29.4	40.7	22.4	79.4	144.0	131.9	64.3	23.0
10	4.3	12.4	24.5	32.1	22.0	85.0	151.8	142.8	65.9	21.3
30	4.2	12.8	16.5	23.4	25.2	69.3	129.0	126.3	59.2	16.6
50	4.2	10.2	15.4	25.3	29.5	71.8	122.8	126.2	56.8	15.4
70	4.2	8.8	18.1	30.5	33.4	81.8	123.1	121.2	54.2	14.9
100	4.7	8.9	24.3	41.0	37.5	82.2	122.6	113.2	50.5	14.2
150	5.5	11.7	33.1	52.0	42.7	101.0	117.6	102.5	47.0	14.0
200	5.4	12.6	34.3	52.2	47.5	108.3	113.4	95.2	46.2	14.4
250	5.1	12.0	32.5	46.5	51.8	113.8	111.0	91.5	46.7	14.9
300	4.8	10.9	29.3	39.7	53.7	113.5	107.4	88.6	46.1	14.3
400	4.2	8.6	22.4	29.8	52.0	102.7	93.5	78.2	41.2	12.6
500	3.6	7.1	16.3	24.0	46.6	88.3	76.7	64.6	34.9	11.5
700	3.7	7.2	8.9	21.2	32.2	63.8	50.1	37.9	24.3	9.7
850	4.0	7.9	9.1	19.5	23.4	57.3	46.0	21.3	16.8	7.8
1000	3.7	7.4	15.6	17.8	20.8	68.7	62.1	23.5	10.3	5.8

TABLE 4 d AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 2 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE APRIL

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	19.6	18.5	31.5	58.8	69.1	61.8	53.7	57.9	74.3	21.4
1	17.0	19.6	32.3	53.7	50.9	62.5	59.8	58.6	60.2	17.3
2	13.5	20.7	34.4	52.9	44.4	69.2	68.7	59.6	46.6	14.2
5	6.8	19.9	34.8	51.5	40.4	74.3	84.1	72.3	35.3	13.8
10	4.2	18.0	26.8	38.4	38.6	66.2	87.0	80.2	33.6	13.4
30	4.1	12.9	11.1	19.1	12.6	31.1	65.1	73.0	31.8	9.6
50	4.1	9.4	7.5	18.7	14.0	24.7	58.9	60.2	26.5	8.0
70	4.0	7.2	10.2	16.4	24.9	29.2	56.0	55.8	22.5	7.2
100	4.4	7.3	20.7	19.2	33.0	37.3	57.1	54.5	20.7	6.7
150	5.2	11.3	29.5	21.7	38.7	44.1	58.9	55.0	22.2	7.7
200	5.2	12.2	28.7	21.6	44.0	47.5	60.3	56.7	25.6	9.0
250	4.8	11.4	25.2	20.3	48.1	49.6	60.8	58.9	28.9	10.2
300	4.3	9.9	20.5	19.0	48.8	49.6	58.7	59.5	30.7	10.8
400	3.5	7.4	12.5	18.3	44.7	45.6	49.7	53.7	29.1	10.1
500	3.3	6.4	7.4	17.9	38.5	40.4	39.3	43.9	25.0	9.2
700	3.4	6.9	6.1	15.2	22.1	31.4	23.9	24.3	19.0	8.0
850	3.7	7.1	10.9	17.3	12.5	26.8	18.1	13.1	16.2	6.8
1000	3.8	7.2	20.5	25.5	14.5	24.9	21.5	11.7	11.6	4.9

TABLE 4 e AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 2 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MAY

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	15.4	19.2	31.5	58.9	47.9	29.9	23.2	30.2	28.2	13.2
1	12.1	18.0	32.4	57.0	45.3	32.3	22.8	29.2	25.1	12.1
2	8.4	17.1	33.5	57.3	44.9	32.9	23.3	28.4	22.8	11.4
5	5.0	17.4	35.8	58.1	45.5	30.6	26.5	29.7	20.4	10.6
10	3.7	17.0	30.5	42.0	34.5	28.1	23.8	25.1	18.0	9.1
30	3.7	12.8	17.5	11.5	18.0	20.8	17.6	12.4	13.0	5.9
50	3.6	9.9	13.3	12.1	27.2	37.8	28.6	18.5	12.4	5.2
70	3.5	7.7	15.2	20.5	40.9	54.0	39.9	28.4	14.6	5.2
100	3.6	6.3	24.7	32.2	50.4	67.9	50.0	35.2	17.5	5.5
150	3.9	6.8	32.5	37.3	51.1	79.6	57.1	46.1	22.2	6.3
200	3.5	8.2	29.3	32.5	51.9	90.1	61.4	58.2	27.5	8.0
250	3.2	7.8	22.5	24.6	53.3	97.1	64.5	64.6	31.2	9.3
300	3.1	6.7	15.2	17.2	53.3	97.6	65.1	68.3	31.6	9.5
400	3.1	6.2	5.0	10.3	49.0	89.1	60.5	64.5	28.9	8.8
500	3.4	6.2	6.5	12.8	43.1	78.5	54.1	55.6	25.5	7.6
700	3.7	10.5	13.3	20.8	26.6	58.1	41.9	36.3	18.6	6.1
850	3.8	11.0	18.5	27.7	17.2	42.3	31.8	22.1	14.5	5.1
1000	3.3	11.7	28.4	36.3	22.8	25.1	19.3	14.5	12.8	4.7

TABLE 4 f AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 2 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JUNE

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	17.0	17.9	35.0	58.8	49.1	32.6	22.4	25.0	24.5	12.9
1	13.5	17.4	35.2	58.2	45.0	30.8	21.3	23.4	24.4	13.0
2	10.1	16.9	35.2	57.1	42.8	29.3	21.1	22.8	24.5	13.2
5	5.0	17.5	36.2	57.2	40.9	27.1	21.9	22.0	25.2	13.8
10	4.4	18.6	28.7	41.4	30.3	28.5	18.8	20.4	20.8	11.0
30	4.4	11.1	11.7	16.3	31.2	25.7	14.1	16.4	10.0	4.3
50	4.3	7.8	7.3	17.2	36.2	27.9	15.6	17.5	9.6	3.3
70	4.2	5.7	15.3	30.9	47.7	34.1	18.1	19.8	11.1	3.8
100	4.3	6.0	29.8	55.2	60.4	38.7	21.0	23.9	13.8	4.6
150	4.8	6.3	39.7	72.3	61.1	36.1	28.8	31.4	18.9	6.3
200	5.3	6.3	34.9	66.0	54.0	36.8	33.3	39.2	24.4	8.4
250	5.2	5.8	24.9	51.8	47.6	40.1	37.7	45.7	28.8	10.7
300	4.4	6.0	14.9	37.9	43.0	41.4	38.5	48.0	33.2	12.2
400	3.7	8.8	4.5	21.8	37.5	39.0	37.6	43.8	31.8	12.1
500	3.6	11.2	14.0	17.6	33.8	35.4	35.6	36.0	26.4	10.2
700	3.7	13.8	25.2	18.6	22.3					

TABLE 49 AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 2 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JULY

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	15.1	9.2	10.0	53.0	54.3	43.9	27.8	28.4	21.3	10.4
1	12.6	10.4	21.8	54.0	51.4	41.4	28.3	26.5	21.9	10.9
2	10.7	11.9	43.4	52.2	47.3	39.2	24.7	23.9	22.6	11.3
5	6.3	11.3	24.1	53.0	43.7	36.1	24.1	22.5	23.5	11.7
10	4.4	9.6	18.5	38.5	32.8	32.3	19.0	20.0	19.9	9.8
30	4.3	5.6	9.2	15.6	37.6	25.3	9.5	11.0	8.5	4.0
50	4.4	4.2	8.8	18.8	42.3	28.2	9.7	11.3	7.7	3.5
70	4.4	4.5	13.4	30.3	55.8	32.1	15.8	15.7	9.0	3.6
100	4.3	5.3	23.6	53.5	75.9	35.3	21.0	21.5	10.6	3.5
150	4.7	4.7	28.8	68.3	88.0	28.1	25.1	29.1	14.4	4.7
200	4.7	3.8	23.6	62.7	82.4	23.0	30.1	35.4	19.9	6.9
250	4.5	4.2	15.3	49.9	70.6	21.9	34.4	40.8	25.0	8.8
300	3.8	5.1	7.8	38.4	53.5	21.0	38.8	43.6	27.4	9.8
400	3.1	6.8	6.9	15.5	44.3	19.7	38.8	42.5	26.1	9.7
500	3.1	7.9	14.1	7.2	35.2	19.4	34.8	38.6	22.4	8.4
700	3.7	10.1	22.0	17.6	20.8	19.7	33.7	31.5	16.5	6.2
850	3.7	11.4	26.9	29.4	21.8	23.7	32.0	28.0	13.1	5.4
1000	3.8	13.1	33.2	43.0	45.7	40.2	29.7	20.1	9.9	4.8

TABLE 48 AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 2 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE AUGUST

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	13.6	16.1	28.8	53.8	40.7	43.3	39.8	30.3	29.0	11.3
1	11.0	15.8	30.2	53.8	37.7	39.6	37.4	27.2	27.5	11.0
2	8.7	14.9	30.5	52.4	33.9	35.8	34.2	23.5	26.3	10.7
5	5.1	14.0	30.8	54.4	33.9	31.8	33.1	20.2	25.3	10.5
10	3.8	12.5	24.0	40.4	28.7	28.0	29.1	17.7	21.0	8.6
30	3.8	8.2	10.4	13.9	29.3	17.4	16.9	11.1	10.3	3.3
50	3.8	8.8	10.1	16.1	30.7	18.8	19.2	16.0	10.4	3.6
70	3.8	7.2	15.2	27.4	37.8	19.4	25.0	21.1	11.2	4.0
100	3.4	7.6	24.2	50.1	52.2	21.9	34.1	27.8	12.5	4.2
150	3.9	5.8	27.3	68.2	62.6	25.8	46.5	35.0	14.9	5.1
200	4.4	4.3	21.7	65.1	58.6	28.0	56.4	38.8	17.3	6.6
250	4.3	4.8	14.2	53.2	49.3	27.3	62.6	39.7	19.5	7.8
300	3.9	5.6	8.0	40.1	40.6	26.1	63.8	38.4	21.1	8.6
400	3.2	6.7	7.9	19.1	29.8	26.5	59.5	33.5	20.2	8.4
500	3.1	7.2	13.9	8.7	24.8	28.2	53.3	28.6	17.7	7.5
700	3.7	8.3	20.2	15.3	20.7	28.6	41.8	21.2	14.2	6.4
850	3.8	9.8	22.8	23.6	20.1	25.8	32.9	18.0	11.9	6.1
1000	3.9	11.7	26.5	33.7	35.8	28.6	23.5	10.7	9.0	5.6

TABLE 41 AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 2 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE SEPTEMBER

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	18.1	18.1	39.2	64.7	37.0	54.8	49.8	59.9	30.5	11.9
1	13.7	18.6	40.5	63.6	34.4	50.5	48.5	57.5	33.9	13.1
2	11.1	19.6	41.2	61.8	32.1	48.9	53.8	58.2	37.8	14.6
5	5.8	18.9	41.1	61.2	31.5	47.6	68.1	61.6	43.2	16.5
10	3.8	17.0	33.3	45.7	26.9	41.8	64.4	58.5	41.1	15.3
30	3.7	12.1	15.3	15.6	20.0	20.0	48.0	38.5	25.7	8.9
50	3.7	9.7	11.3	9.9	18.0	22.5	48.8	37.9	20.4	7.0
70	3.8	8.7	14.1	13.8	18.3	30.8	50.8	41.0	19.7	6.5
100	3.5	7.5	24.3	32.4	23.2	40.8	57.6	44.8	20.0	6.2
150	3.8	5.4	33.1	51.3	26.3	51.8	68.1	48.0	23.0	7.3
200	3.9	4.2	30.1	48.7	25.5	57.5	71.2	48.9	27.4	9.5
250	3.7	4.3	22.5	37.3	23.8	59.1	72.9	48.2	30.3	11.3
300	3.4	5.3	14.5	25.4	22.9	58.2	71.0	45.9	30.3	11.8
400	2.9	7.2	6.7	8.8	23.2	53.7	62.2	39.1	26.5	10.7
500	3.1	8.4	11.7	6.4	24.0	48.1	52.7	31.5	22.1	8.9
700	3.4	9.3	17.5	16.7	19.7	37.6	38.1	17.6	14.9	5.9
850	2.9	9.0	18.3	20.8	10.1	28.2	30.1	10.7	11.8	4.5
1000	2.5	9.0	20.9	26.4	14.1	18.6	25.4	12.2	11.4	4.2

TABLE 42 AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 2 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE OCTOBER

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	15.2	17.7	27.7	39.3	68.8	82.0	98.6	95.8	56.0	19.5
1	13.8	16.3	31.0	41.0	67.8	84.2	106.8	108.5	62.0	21.4
2	12.9	16.0	34.1	43.9	65.8	84.5	120.0	126.0	69.1	23.5
5	6.4	15.8	38.9	48.9	60.7	85.1	140.1	145.3	75.8	25.5
10	3.8	14.7	31.8	42.4	53.8	77.9	134.7	133.1	88.7	23.7
30	3.9	11.3	13.9	27.3	35.6	56.0	97.9	89.1	44.2	16.1
50	3.8	9.3	9.3	25.3	29.3	52.7	84.2	74.6	35.2	12.6
70	3.6	7.8	11.0	25.0	28.6	56.1	81.7	69.7	31.5	10.9
100	3.5	4.9	16.3	32.1	33.8	63.6	84.0	68.0	30.1	10.3
150	4.0	3.9	26.8	43.7	41.4	73.7	91.2	69.5	33.4	11.9
200	4.4	4.8	26.6	43.1	40.2	79.9	98.1	71.3	38.1	14.4
250	4.2	4.6	21.5	35.9	33.2	81.9	101.1	71.1	40.5	16.0
300	3.8	4.7	15.1	28.0	25.8	80.0	98.9	68.0	39.5	15.8
400	3.0	5.8	5.6	16.3	20.2	71.5	86.6	57.6	32.7	13.0
500	2.8	6.6	3.4	11.8	19.8	62.2	72.2	46.4	25.3	9.7
700	2.7	6.2	7.1	11.9	16.2	47.5	49.0	27.5	14.0	4.9
850	2.1	4.4	7.1	11.4	10.4	41.1	39.8	18.5	8.7	3.0
1000	1.7	3.5	10.1	11.8	8.9	41.3	44.4	14.9	9.4	5.0

TABLE 43 AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 2 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE NOVEMBER

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	11.2	22.2	44.4	81.9	109.3	100.8	111.2	128.4	80.1	28.8
1	9.7	17.8	36.3	78.8	88.6	85.3	122.3	141.0	87.3	30.9
2	8.0	13.6	29.3	63.0	75.9	87.7	138.4	153.7	93.6	32.8
5	4.7	8.4	26.9	50.8	71.1	83.8	148.3	158.8	95.6	33.5
10	4.7	10.6	24.0	43.8	60.8	80.8	143.2	147.4	88.7	31.2
30	4.8	10.0	12.1	32.4	39.1	65.4	122.3	115.5	63.8	21.7
50	4.7	7.9	9.5	31.0	34.1	64.4	113.0	102.5	50.8	16.3
70	4.7	5.4	9.1	30.7	34.4	68.3	108.8	95.5	43.6	13.3
100	4.8	6.2	17.0	35.5	40.0	70.0	106.9	90.2	37.8	10.9
150	5.3	8.6	28.4	43.9	48.0	75.7	110.3	87.7	34.8	10.0
200	5.1	9.4	28.6	44.6	52.2	80.6	118.5	87.3	35.5	10.8
250	4.5	7.8	24.0	41.2	50.4	83.0	121.0	85.4	36.6	11.7
300	3.9	5.9	18.5	36.7	46.2	82.1	120.4	81.1	35.7	11.6
400	3.1	3.5	11.2	28.9	37.3	74.8	107.8	68.3	31.0	10.0
500	2.7	3.8	7.5	24.0	29.9	65.4	90.2	54.2	25.4	8.3
700	3.0	5.2	6.8	19.3	19.8	48.6	58.7	29.0	15.9	5.8
850	2.9	4.4	7.3	18.7	19.9	45.1	48.5	17.4	10.8	4.4
1000	3.0	4.4	9.7	14.4	25.1	57.8	60.5	30.0	13.7	5.0

TABLE 44 AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 2 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE DECEMBER

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	25.1	13.0	38.7	84.4	189.3	248.6	191.7	131.1	75.7	28.6
1	18.8	12.2	30.5	72.5	152.3	219.7	189.8	135.5	82.5	31.5
2	13.1	12.3	24.9	54.8	144.7	215.9	208.3	154.7	91.5	34.6
5	4.3	9.9	12.8	47.8	135.8	200.1	230.6	181.1	101.7	37.8
10	2.8	9.2	13.4	42.4	108.3	173.1	238.9	185.3	101.6	37.5
30	3.0	9.9	15.2	37.8	61.4	136.8	207.2	155.1	80.0	28.9
50	3.1	8.0	14.1	38.2	54.8	124.6	179.1	130.7	64.5	22.8
70	3.1	5.1	10.0	34.1	55.8	121.0	180.4	113.7	55.0	19.2
100	3.7	4.7	20.2	38.3	59.1	120.8	143.4	98.3	46.7	15.9
150	4.9	9.3	30.2	45.1	63.9	123.1	129.0	86.5	41.0	13.4
200	5.2	10.4	30.4	43.5	85.8	125.8	121.5	82.3	39.9	12.8
250	4.8	9.4	27.0	38.3	66.0	125.4	115.3	80.2	39.6	12.6
300	4.0	7.9	22.7	33.7	64.2	121.0	107.5	77.4	38.2	12.0
400	3.0	5.5	15.0	27.0	57.6	105.5	88.7	68.4	33.2	10.2
500	2.6	3.8	9.8	22.1	49.7	88.2	70.0	57.6	27.5	8.3
700	2.9	3.5	6.2	14.8	37.4	63.1	40.1	35.8	17.9	5.4
850	3.2	4.8	5.7	12.5	38.8	55.7	29.5			

TABLE 5g AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 3 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JULY

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	12.9	10.9	29.1	51.5	59.1	43.7	10.0	22.0	9.8	4.3
1	10.1	16.1	23.3	45.6	54.4	37.9	18.2	23.4	9.7	4.3
2	6.9	13.7	17.5	40.3	51.4	33.6	16.4	24.6	9.8	4.4
5	3.5	14.0	13.0	35.2	49.2	31.4	20.0	25.8	10.1	4.4
10	2.5	13.9	12.3	26.8	44.7	28.8	16.5	20.5	8.7	3.7
30	2.5	11.0	11.1	15.5	30.3	18.5	12.3	11.5	6.0	2.3
50	2.5	10.0	10.2	11.9	20.7	13.3	15.1	11.3	5.8	1.9
70	2.8	10.7	10.6	9.8	19.4	13.6	18.2	12.8	5.5	1.8
100	2.8	11.8	14.0	9.8	22.0	16.9	22.9	15.6	5.3	1.6
150	2.9	10.9	17.8	20.4	23.0	21.8	30.2	21.4	6.5	1.4
200	2.5	8.6	17.0	25.6	21.8	24.5	37.3	27.3	8.5	1.5
250	2.1	6.3	15.1	24.3	20.7	23.8	41.7	31.8	10.4	1.8
300	1.7	4.3	13.2	20.5	20.2	25.5	41.9	33.2	11.6	2.2
400	1.1	2.4	11.1	13.2	22.0	23.9	37.2	29.8	11.0	2.2
500	0.9	2.5	10.8	8.3	24.5	22.4	31.9	24.8	9.0	1.8
700	0.9	2.5	10.0	7.4	25.6	18.2	21.9	16.1	6.0	1.3
850	1.6	2.5	7.1	12.9	25.5	14.4	13.8	10.0	4.8	1.2
1000	3.5	2.8	5.2	22.0	28.2	11.2	8.8	3.8	3.5	1.0

TABLE 5h AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 3 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE AUGUST

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	11.9	19.0	25.8	39.7	53.4	44.6	19.8	18.8	6.9	2.6
1	8.7	17.0	20.9	35.1	49.5	39.7	17.2	18.1	7.1	2.7
2	6.1	15.0	16.5	31.6	46.2	35.3	15.7	18.0	7.6	2.8
5	3.5	14.8	12.1	28.4	43.5	31.2	16.1	18.4	8.2	2.9
10	2.8	14.3	11.1	21.7	40.0	27.5	12.4	14.5	7.5	2.6
30	2.8	11.4	9.6	12.2	27.1	16.3	9.8	8.0	4.6	1.7
50	2.7	10.0	8.8	9.1	17.1	13.2	14.2	10.2	3.6	1.3
70	2.7	9.8	9.2	7.4	15.9	16.7	17.9	12.1	3.8	1.2
100	2.4	9.5	12.0	8.5	17.2	23.3	21.9	15.0	4.4	1.2
150	1.9	7.5	14.6	18.5	19.2	30.5	25.1	19.9	6.0	1.3
200	2.2	5.6	13.1	20.8	19.8	34.8	27.3	24.6	7.9	1.5
250	2.5	4.5	11.2	19.9	17.4	35.7	29.6	28.5	9.4	1.6
300	2.2	3.6	10.2	17.0	15.2	33.9	30.3	30.0	9.9	1.8
400	1.5	3.2	9.7	11.4	14.7	29.0	28.2	27.8	8.7	2.0
500	1.3	3.2	9.9	7.7	16.6	25.2	25.2	24.1	6.9	1.8
700	1.2	3.0	8.9	6.8	19.4	18.0	18.5	16.7	5.3	1.4
850	1.4	2.5	8.6	11.2	20.9	12.3	12.7	10.7	5.0	1.4
1000	2.8	2.8	7.2	20.9	22.4	7.5	8.5	4.6	5.5	1.4

TABLE 5i AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 3 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE SEPTEMBER

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	8.8	14.9	18.3	31.9	49.2	42.0	22.9	15.1	8.6	2.9
1	6.3	12.7	15.8	31.8	47.8	40.5	18.8	13.9	9.5	3.0
2	3.7	11.5	13.5	31.7	46.3	40.4	16.4	14.5	10.6	3.1
5	1.8	10.2	11.1	31.3	48.2	43.1	15.5	17.3	11.9	3.3
10	2.4	9.2	10.7	25.3	41.6	37.6	14.8	17.5	10.8	3.0
30	2.4	7.0	10.4	16.1	24.9	17.1	18.2	15.6	7.6	2.0
50	2.4	6.2	8.9	15.2	17.5	14.1	19.8	14.1	6.5	1.8
70	2.4	6.4	8.6	15.9	20.6	14.9	22.1	13.5	5.7	1.7
100	2.1	6.3	10.8	19.1	29.9	17.6	26.6	14.5	5.3	1.5
150	1.8	4.7	12.4	24.0	37.9	23.8	34.1	17.8	5.3	1.3
200	2.0	2.8	11.9	28.0	37.8	31.3	40.4	20.5	8.0	1.3
250	2.2	1.8	11.1	24.9	33.3	37.2	44.4	22.2	7.4	1.7
300	1.8	1.4	10.4	22.8	28.8	39.6	45.0	22.0	8.8	2.1
400	1.0	1.9	9.3	18.8	22.5	38.0	41.0	19.0	9.5	2.3
500	0.9	2.5	8.5	16.7	19.2	33.9	35.8	15.5	8.6	1.9
700	1.4	2.9	4.9	11.8	15.8	23.9	26.9	9.8	6.7	1.4
850	1.4	2.8	3.7	9.8	13.7	18.4	22.5	7.1	8.3	1.7
1000	2.2	2.1	8.3	18.7	11.9	12.2	21.5	8.8	7.8	2.2

TABLE 5j AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 3 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE OCTOBER

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	12.9	12.4	20.5	35.1	44.6	48.9	29.4	21.9	10.3	2.2
1	11.1	11.8	18.9	34.2	45.1	45.9	24.4	19.7	9.0	2.0
2	8.8	12.3	17.8	33.6	43.8	42.4	21.9	18.1	8.7	1.9
5	1.9	12.3	17.2	31.2	41.5	36.6	21.9	17.0	8.8	2.0
10	2.1	10.9	16.5	22.8	32.4	26.2	25.8	16.8	8.1	1.8
30	2.1	7.4	12.4	15.8	18.8	20.1	29.8	17.7	6.5	1.5
50	2.1	6.3	8.5	18.7	23.8	23.3	28.9	18.1	6.0	1.3
70	2.1	6.0	4.9	21.0	30.1	25.3	30.6	19.6	5.9	1.2
100	1.8	5.5	9.0	26.1	37.8	29.8	36.1	22.2	6.1	1.2
150	1.6	4.6	16.1	30.7	44.2	38.0	46.1	26.0	7.0	1.4
200	1.7	3.8	17.8	32.6	45.2	44.1	54.4	29.5	8.0	1.8
250	1.8	2.9	16.8	32.4	43.2	47.7	58.6	32.0	9.0	2.1
300	1.5	2.4	15.1	30.6	39.8	48.4	58.2	32.4	9.8	2.4
400	1.1	2.2	11.7	26.2	33.8	45.1	51.9	28.9	9.8	2.6
500	1.1	2.3	9.0	22.5	29.1	39.9	45.1	23.9	8.5	2.4
700	1.5	3.8	5.5	14.9	20.2	29.3	34.4	16.0	6.4	1.9
850	1.2	5.0	7.4	10.2	14.4	23.3	29.7	13.2	5.7	1.5
1000	2.1	4.4	8.4	13.5	9.9	21.7	28.8	13.6	7.2	1.8

TABLE 5k AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 3 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE NOVEMBER

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	9.1	20.3	33.4	48.8	56.1	55.2	35.8	32.4	8.6	2.5
1	7.3	17.6	29.1	45.5	49.8	48.5	31.4	28.8	8.5	2.3
2	6.8	15.4	25.1	41.5	42.1	38.5	32.6	25.2	8.9	2.4
5	3.0	11.5	19.2	33.3	33.1	31.4	34.8	20.4	9.9	2.5
10	2.2	9.3	15.6	25.5	25.2	24.9	30.3	21.3	9.3	2.4
30	2.1	6.7	12.2	18.1	23.8	23.0	23.7	18.6	6.6	1.7
50	2.1	5.8	9.8	19.4	27.9	30.2	28.9	18.5	5.4	1.6
70	2.0	4.5	9.1	22.8	31.8	35.4	30.5	18.5	4.4	1.4
100	2.0	4.2	16.8	29.1	38.6	42.9	35.0	18.4	3.9	1.3
150	2.2	7.9	23.4	34.5	47.6	53.9	40.9	19.6	5.3	1.4
200	2.4	8.2	24.5	35.4	51.4	60.8	45.4	22.2	7.8	1.6
250	2.3	7.3	23.1	33.8	51.7	62.3	47.5	25.5	8.9	1.9
300	1.7	6.5	20.8	31.1	49.9	60.3	47.1	27.4	11.1	2.1
400	0.8	5.4	15.9	25.4	44.8	53.7	42.1	28.0	11.3	2.1
500	0.7	4.7	11.8	20.4	38.9	47.1	35.2	21.7	10.0	2.0
700	1.5	4.1	5.5	11.1	26.9	35.3	22.0	15.0	8.3	1.7
850	1.9	4.2	3.8	8.2	23.7	29.3	17.9	12.7	8.5	1.8
1000	1.9	3.8	6.1	7.2	21.9	28.1	24.8	14.3	10.2	2.3

TABLE 5l AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 3 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE DECEMBER

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	15.5	19.2	40.0	53.7	68.9	72.4	27.7	21.2	8.3	2.4
1	9.1	13.9	35.4	51.0	63.9	63.7	31.2	21.2	8.1	2.2
2	5.3	12.7	31.0	50.4	71.2	55.9	39.5	24.6	8.6	2.1
5	2.2	14.1	21.6	42.5	50.0	41.7	50.6	31.3	10.0	2.2
10	2.3	13.8	13.9	29.4	32.8	35.1	50.4	35.5	10.7	2.3
30	2.3	11.3	12.4	17.3	21.9	37.2	52.1	37.3	10.5	2.1
50	2.2	9.0	7.6	18.3	31.4	47.1	58.5	35.2	10.1	2.0
70	2.2	7.3	8.8	18.2	38.5	54.3	58.7	33.7	9.8	2.0
100	2.8	6.5	20.8	22.0	49.7	64.4	61.7	32.4	8.7	1.9
150	3.7	9.6	30.7	24.0	63.9	79.8	66.2	32.6	8.5	2.0
200	3.8	9.9	32.3	22.4	71.8	90.2	69.5	34.9	9.3	2.2
250	3.5	8.9	30.3	20.3	74.7	83.5	71.2	36.3	10.0	2.4
300	2.8	8.0	27.0	18.5	73.9	90.9	70.3	34.9	10.4	2.5
400	1.8	6.2	20.3	16.1	66.1	80.0	62.0	30.0	10.2	2.5
500	1.3	5.0	14.8	15.3	57.6	68.3	51.6	24.1	9.4	2.5
700	1.6	4.2	6.0	13.3	41.7	45.2	32.6	16.5	7.7	2.4
850	1.8	5.0	3.4	12.8	33.0	31.8	25.9	14.8	8.3	2.2
1000	2.3	6.0	8.3	15.5	29.4	24.8	28.9	18.6	6.5	2.1

TABLE 5a AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 3 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JANUARY

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	18.2	13.4	30.0	45.6	85.5	118.2	57.9	37.2	11.5	2.5
1	13.0	11.4	26.8	46.5	89.5	118.9	69.9	32.7	9.2	2.2
2	10.3	12.0	24.9	46.0	92.8	121.3	82.6	36.6	7.9	2.1
5	4.4	12.0	22.1	45.0	90.3	114.6	87.2	40.1	6.1	1.7
10	2.9	12.5	18.7	34.3	73.8	97.0	83.0	38.3	6.8	1.6
30	2.8	10.8	14.0	16.5	53.6	81.7	85.4	48.7	12.1	1.8
50	2.7	8.8	10.6	17.3	54.8	86.0	89.5	52.7	14.5	2.3
70	2.7	6.6	10.3	18.8	80.8	94.0	92.9	59.8	15.6	2.5
100	3.8	7.2	23.1	22.6	72.0	106.9	96.6	54.1	15.2	2.4
150	6.0	13.8	35.4	27.2	89.2	124.5	101.1	55.2	14.3	2.3
200	6.2	14.7	37.9	27.4	102.1	136.3	103.7	57.1	14.4	2.3
250	5.7	13.3	36.0	25.4	108.9	140.5	103.1	57.9	14.5	2.5
300	4.6	11.5	32.8	23.2	109.2	137.1	98.4	56.2	14.4	2.5
400	3.1	8.7	25.7	20.3	99.8	121.8	84.7	48.8	13.3	2.6
500	2.2	6.2	18.9	18.1	86.5	104.6	71.3	40.8	11.7	2.5
700	1.8	3.6	8.2	14.3	61.5	74.2	50.5	28.6	9.6	2.4
850	2.2	3.5	3.1	13.1	47.7	57.0	42.8	23.1	8.5	2.7
1000	1.9	5.8	6.0	18.0	41.7	48.8	45.9	23.3	8.4	2.7

TABLE 5b AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 3 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE FEBRUARY

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	18.6	11.3	27.3	35.9	56.0	97.8	84.1	44.3	18.8	4.2
1	14.7	9.3	23.1	31.2	49.9	99.2	93.4	52.6	18.8	3.9
2	10.1	11.9	20.5	25.5	48.4	105.9	106.1	63.6	20.4	4.0
5	5.0	16.1	23.4	20.1	48.7	109.8	113.8	74.3	22.9	4.4
10	4.4	18.9	26.3	18.3	50.8	101.1	108.4	69.1	20.2	3.8
30	4.4	13.2	22.5	15.9	46.6	79.7	87.3	46.0	13.2	2.7
50	4.4	10.0	15.6	14.3	45.0	75.5	78.2	35.2	11.0	2.6
70	4.4	8.2	11.8	14.4	47.5	72.2	71.4	31.4	10.6	2.6
100	3.6	4.7	23.7	18.4	54.5	76.8	68.8	29.6	10.6	2.6
150	4.0	10.9	35.0	21.3	68.4	85.9	66.6	29.0	10.1	2.6
200	4.3	12.2	36.9	18.3	81.3	93.2	65.9	30.2	9.5	2.4
250	4.0	11.3	34.4	14.7	89.1	96.2	65.5	32.4	9.2	2.4
300	3.4	9.8	30.4	12.0	90.1	94.3	63.4	33.1	9.0	2.4
400	2.4	7.3	21.8	11.4	82.0	83.9	54.9	30.1	8.8	2.3
500	1.7	5.4	14.5	11.2	70.1	71.8	45.2	25.5	8.1	2.1
700	1.5	3.4	5.1	9.4	48.5	49.4	30.6	17.5	6.5	1.7
850	1.5	4.4	2.0	10.1	37.2	38.9	34.2	12.8	4.9	1.8
1000	1.3	6.1	4.5	14.1	31.6	38.4	47.1	13.9	6.9	2.6

TABLE 5c AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 3 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MARCH

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	19.8	19.9	29.4	42.0	47.7	66.9	49.8	22.1	30.0	11.1
1	16.2	17.4	25.9	39.7	42.0	63.0	46.6	19.2	25.1	8.8
2	12.4	15.9	23.2	37.8	35.8	59.3	46.0	21.2	20.3	6.7
5	4.9	15.5	20.4	36.1	31.9	56.8	45.0	24.1	15.8	4.7
10	4.1	16.1	22.3	28.6	29.5	53.1	40.2	20.8	13.6	3.9
30	4.1	14.6	21.6	18.9	29.8	44.3	30.7	15.5	9.0	2.5
50	4.1	12.5	15.3	17.0	31.0	45.5	32.4	17.2	7.5	2.0
70	4.1	9.8	11.5	21.0	34.9	50.8	37.4	20.5	7.5	1.8
100	3.6	6.9	20.8	28.1	43.6	59.6	43.2	23.8	7.5	1.7
150	3.1	8.1	34.8	32.8	59.7	73.3	61.2	27.3	7.8	1.5
200	3.0	8.9	38.9	30.5	73.4	83.9	53.1	29.4	8.9	1.7
250	2.7	8.5	37.5	25.5	81.1	88.8	54.7	30.3	10.7	2.1
300	2.3	7.8	33.5	20.9	81.9	87.9	53.9	29.9	11.9	2.5
400	1.6	5.8	24.1	15.2	74.8	79.5	46.8	28.8	11.5	2.6
500	1.2	3.8	15.6	14.3	65.5	70.2	39.5	22.8	9.9	2.1
700	1.4	3.4	6.0	13.5	47.1	52.4	27.3	16.4	7.0	1.3
850	1.6	5.1	5.0	11.3	35.6	40.6	21.1	11.9	5.7	1.3
1000	1.5	7.8	3.8	11.1	26.8	28.1	28.7	11.1	4.4	2.1

TABLE 5d AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 3 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE APRIL

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	11.9	19.7	25.2	39.4	45.3	55.8	42.6	39.6	51.0	12.8
1	9.5	18.1	21.2	41.7	44.6	48.7	35.6	33.0	37.3	9.3
2	7.3	17.4	17.6	43.6	44.0	40.1	28.5	26.2	23.4	5.7
5	2.9	16.8	16.7	43.3	44.8	32.4	21.5	19.7	11.4	3.3
10	2.9	14.6	16.6	31.7	32.3	23.5	12.9	18.4	10.2	3.3
30	3.0	11.6	15.4	14.2	15.2	19.1	13.1	14.4	9.8	2.8
50	3.0	11.1	12.7	13.6	26.8	29.1	21.8	13.1	9.1	2.5
70	3.1	10.2	10.2	16.7	36.6	36.2	27.5	14.1	8.5	2.3
100	3.3	8.3	19.3	29.7	47.8	44.2	34.9	17.2	7.9	2.1
150	3.0	7.7	29.6	38.8	61.1	55.7	45.5	21.7	7.4	1.9
200	2.2	7.3	31.4	41.4	68.5	63.5	54.2	25.4	7.5	1.8
250	1.7	6.8	29.9	40.7	69.7	65.4	59.8	28.2	7.3	1.7
300	1.5	6.2	27.2	38.8	68.3	62.8	61.3	29.4	7.2	1.7
400	1.6	5.2	21.4	34.9	55.7	56.0	57.7	26.6	6.5	1.6
500	1.7	4.4	16.1	31.8	45.4	50.3	51.1	21.4	5.0	1.3
700	1.3	3.0	8.2	24.0	28.0	39.0	36.8	12.5	2.8	0.7
850	1.2	4.9	7.2	16.7	19.5	30.4	26.2	9.3	3.7	1.1
1000	1.9	7.7	6.7	12.8	14.7	19.2	17.3	8.2	4.3	2.0

TABLE 5e AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 3 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MAY

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	7.9	19.2	29.9	54.4	53.2	43.7	21.3	26.1	16.1	5.2
1	5.3	17.1	25.3	51.5	49.2	36.9	15.9	24.2	15.5	5.1
2	4.1	16.1	21.7	47.4	44.1	30.4	12.4	24.1	14.7	4.9
5	3.0	15.5	19.3	42.1	39.2	25.2	11.5	25.2	13.9	4.8
10	3.6	14.7	17.9	31.9	34.4	20.4	7.6	19.2	12.1	4.1
30	3.7	12.3	16.0	18.1	23.5	11.9	6.1	7.7	8.8	2.9
50	3.8	11.9	14.2	16.2	18.4	9.9	10.0	7.8	7.7	2.6
70	3.9	12.3	12.9	17.4	25.4	10.5	13.4	9.6	7.1	2.5
100	3.7	11.1	13.6	21.0	36.7	12.3	18.2	12.1	6.3	2.2
150	2.6	10.2	18.9	24.1	46.6	13.5	28.0	15.3	5.4	1.9
200	1.5	9.3	19.6	24.2	48.5	15.2	35.0	18.8	5.0	1.7
250	1.0	8.0	17.8	24.2	46.0	16.1	42.8	22.3	5.1	1.8
300	1.1	6.9	15.6	24.4	42.2	16.4	48.1	24.8	5.6	2.0
400	1.2	5.0	12.5	24.5	35.9	17.7	43.7	24.8	5.1	2.1
500	1.3	4.0	10.6	24.2	31.4	16.7	38.2	21.7	3.8	1.7
700	1.1	2.7	7.8	21.3	22.9	12.3	27.3	14.8	3.0	1.0
850	1.1	3.5	8.3	18.8	18.7	8.7	20.2	9.0	3.5	0.8
1000	2.4	5.7	10.3	18.8	17.2	10.0	18.8	7.3	3.3	1.1

TABLE 5f AMPLITUDE (M) OF GEOPOTENTIAL HEIGHT FOR THE ZONAL WAVE-NUMBER 3 IN GEOPOTENTIAL FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JUNE

PRESSURE (MB)	LATITUDE (°N)									
	0	10	20	30	40	50	60	70	80	85
0.4	10.2	12.6	24.4	80.4	60.3	43.6	28.3	30.5	9.8	3.6
1	7.2	10.0	19.8	57.4	54.9	37.3	22.1	30.4	9.5	3.7
2	3.9	8.6	16.6	54.6	50.9	30.6	19.6	30.9	9.2	3.6
5	2.4	10.2	15.8	50.8	47.7	25.8	18.1	30.9	8.7	3.6
10	2.8	9.8	14.4	40.9	42.3	23.4	13.7	24.8	7.5	3.1
30	2.7	7.3	12.5	25.4	29.6	18.9	9.0	12.0	4.6	1.8
50	2.8	8.0	11.1	21.4	23.5	15.0	11.2	12.1	3.4	1.4
70	3.0	10.5	11.5	18.9	23.6	13.5	15.2	13.8	2.9	1.3
100	2.7	11.8	13.4	18.2	29.6	15.3	22.4	16.9	3.2	1.3
150	1.9	10.3	17.8	24.5	35.2	21.6	34.3	23.9	4.9	1.6
200	1.8	8.0	19.1	27.3	34.0	27.8	44.9	31.1	8.8	2.0
250	1.8	6.1	18.5	25.4	31.0	31.3	51.3	36.7	8.0	2.6
300	1.6	4.8	17.7	22.3	28.9	31.9	52.4	38.9	11.1	3.0
400	1.0	4.4	18.3	17.3	27.4	30.9	48.0	35.9	11.8	3.1
500	0.8	4.3	15.1	14.4	27.4	28.4	42.0	30.3	10.3	2.6
700	1.2	3.3	11.7	13.0	25.4	23.0	30.1	20.6	8.1	1.9
850	1.8	2.3	8.2	14.8	23.2	17.8	21.5	14.4	7.1	1.9
1000	3.4	3.2	5.9	18.8	22.2	12.8	13.5	8.7	6.8	2.1

TABLE 6a

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES FOR
NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JANUARY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.6	0.4	-0.5	1.0	12.7	40.0	66.6	61.9	36.6	20.6
1	-0.9	-0.1	0.4	4.4	26.3	73.5	122.1	125.9	87.9	53.0
2	-0.6	0.1	-0.0	4.5	30.5	67.8	145.5	149.7	98.0	56.4
5	-0.2	0.3	-0.2	2.8	21.5	67.6	122.8	135.3	88.0	47.7
10	-0.0	0.6	0.1	1.1	12.8	45.7	86.7	80.3	40.2	16.5
30	-0.2	0.3	-0.3	0.5	6.8	23.8	48.4	45.7	21.7	8.4
50	-0.3	0.5	-0.7	-0.5	5.1	18.7	33.6	27.0	13.1	5.8
70	-0.5	-0.1	-1.8	-1.2	4.7	16.9	26.1	16.5	8.2	4.7
100	-1.1	-0.1	-0.6	-1.1	3.9	13.4	18.6	9.5	3.6	2.1
150	-0.8	-0.9	-1.6	0.3	6.2	14.0	13.0	2.8	1.3	1.9
200	-0.8	-1.1	-1.4	1.6	9.6	15.5	10.5	-0.8	-0.8	0.5
250	-0.6	-1.0	-0.9	2.2	11.1	15.6	8.2	-1.0	-1.2	-0.3
300	-0.5	-0.9	-0.4	2.1	8.9	12.9	6.6	0.2	-0.8	0.4
400	-0.4	-0.7	0.1	1.8	6.0	11.2	6.7	1.8	-0.0	1.1
500	-0.3	-0.4	0.2	1.5	6.7	12.8	7.9	2.6	0.5	1.1
700	-0.2	-0.0	0.3	1.7	8.7	14.9	10.3	3.0	1.4	1.2
850	-0.7	-0.3	0.8	1.6	10.8	21.5	15.8	3.7	1.5	3.0
1000	-2.0	-0.8	1.1	0.9	11.1	25.0	21.6	5.5	2.3	4.8

TABLE 6c

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES FOR
NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MARCH

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.5	0.2	-0.2	-0.8	1.6	6.6	13.9	14.8	7.6	3.7
1	-0.2	-0.3	0.1	0.4	4.4	18.0	34.7	36.9	21.6	12.4
2	-0.3	-0.1	-0.1	0.0	4.2	19.5	38.8	41.1	21.2	10.9
5	0.3	0.3	-0.2	-0.2	2.7	14.0	29.5	30.7	15.3	7.5
10	-0.0	0.8	0.8	-0.2	1.5	7.9	19.7	22.1	6.1	-1.2
30	-0.6	0.1	-0.1	-0.5	0.3	3.9	14.1	14.9	4.3	0.2
50	-0.5	0.4	0.2	-0.9	0.5	3.8	11.3	8.2	-0.9	-2.1
70	-0.4	0.1	-0.1	-1.5	0.7	4.3	9.7	4.4	-3.4	-3.1
100	0.4	0.6	0.2	-0.5	0.7	4.8	7.7	1.2	-5.2	-4.5
150	-0.7	-0.7	-1.0	0.5	2.2	6.0	6.5	-0.5	-5.3	-4.0
200	-0.9	-1.0	-1.2	1.3	4.2	7.7	6.0	-1.9	-4.7	-3.5
250	-0.7	-0.9	-0.8	1.8	4.8	9.2	6.1	-1.9	-3.6	-2.9
300	-0.7	-0.8	-0.6	1.9	3.5	8.6	5.7	-0.4	-1.6	-1.2
400	-0.3	-0.3	-0.1	1.8	2.1	7.5	5.2	1.3	1.1	0.7
500	-0.2	-0.1	0.1	1.5	2.5	8.1	6.0	2.5	2.4	1.7
700	0.2	0.3	0.6	1.2	3.0	8.0	6.8	2.8	3.9	3.2
850	-0.6	-0.3	0.7	1.0	3.9	8.9	9.0	4.5	4.9	3.6
1000	-1.1	-0.8	0.5	-0.1	3.1	7.7	12.2	7.6	6.4	4.5

TABLE 6e

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES FOR
NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MAY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.2	0.2	-0.1	-0.2	-0.0	-0.1	-0.1	-0.2	-0.2	0.0
1	-0.2	0.1	0.1	-0.0	0.4	0.2	-0.2	-0.2	-0.0	0.3
2	-0.2	0.1	-0.1	0.0	0.6	0.4	-0.3	-0.5	0.0	0.4
5	-0.1	0.0	-0.1	0.2	0.3	0.3	-0.1	-0.3	0.1	0.3
10	-0.0	0.5	1.0	-0.2	0.1	0.1	0.7	0.3	-0.2	-0.1
30	-0.4	-0.3	-0.1	-0.3	-0.9	-0.4	0.3	0.7	-0.2	-0.1
50	-0.4	0.1	-0.3	-0.4	-0.9	-0.2	0.3	0.6	-0.0	-0.0
70	-0.3	0.4	0.5	-0.8	-0.3	0.4	0.5	0.7	-0.0	0.0
100	0.8	0.6	0.8	-0.2	1.1	0.7	0.3	0.2	-0.2	-0.1
150	0.3	0.2	0.3	0.4	1.2	0.5	0.5	-0.2	-0.7	-0.4
200	0.1	-0.0	0.1	0.1	0.4	0.6	0.6	-0.8	-1.2	-0.7
250	0.1	-0.0	-0.2	-0.4	-0.5	0.9	0.4	-1.0	-1.7	-1.1
300	0.1	0.1	-0.3	-0.6	-0.5	1.0	-0.2	-0.4	-2.0	-0.6
400	-0.0	0.0	-0.3	0.4	-0.4	0.2	-0.4	-0.0	-0.6	0.2
500	-0.2	-0.1	0.2	-0.4	-0.1	-0.0	0.2	-0.0	0.0	0.4
700	0.2	-0.2	-0.4	0.1	-1.1	-1.3	1.1	0.9	0.5	0.6
850	0.2	-0.5	-0.6	0.9	-1.4	-1.8	1.5	1.2	0.8	0.6
1000	0.6	-0.3	0.1	1.7	-1.7	-2.8	2.0	1.6	0.1	0.3

TABLE 6b

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES FOR
NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE FEBRUARY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.6	0.2	-0.3	-0.5	2.0	11.3	27.0	29.7	21.9	12.8
1	-0.8	-0.2	-0.0	0.4	4.8	24.9	51.8	57.2	42.4	24.2
2	-0.5	-0.0	0.0	0.2	5.9	29.9	64.1	75.8	59.2	34.0
5	-0.1	0.1	0.2	0.3	4.7	23.9	54.7	70.4	59.9	36.1
10	0.0	0.6	0.5	-0.2	2.8	21.0	48.4	44.6	35.2	18.3
30	-0.2	0.1	-0.4	-0.4	2.9	14.7	35.0	35.2	15.7	5.7
50	-0.3	0.3	-0.3	-1.0	2.1	12.0	24.5	21.9	8.9	3.1
70	-0.3	-0.0	-1.0	-1.4	1.7	10.6	19.4	14.8	5.9	1.9
100	0.2	0.3	-0.3	-0.5	1.3	8.8	14.7	9.1	3.0	0.8
150	-0.1	-0.3	-1.0	0.1	2.4	9.2	11.1	5.3	1.1	0.4
200	-0.5	-0.7	-1.1	1.0	5.4	11.1	9.3	2.6	0.3	-0.1
250	-0.7	-0.9	-1.0	1.6	6.9	11.9	8.5	1.0	-0.3	0.2
300	-0.7	-0.9	-0.8	1.7	5.6	10.5	7.3	1.2	-0.2	-0.2
400	-0.6	-0.5	-0.1	1.2	3.8	9.3	7.3	3.6	0.5	-0.2
500	-0.4	-0.3	0.1	1.1	4.8	10.4	8.9	4.8	0.8	0.1
700	0.0	0.1	0.4	1.0	6.3	12.1	11.1	5.2	0.3	0.6
850	-1.0	-0.6	0.6	1.2	8.2	16.9	16.4	7.2	1.5	1.8
1000	-1.9	-1.1	0.3	0.1	7.5	19.0	22.7	11.1	2.7	2.8

TABLE 6d

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES FOR
NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE APRIL

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.4	-0.1	-0.1	-0.3	0.1	1.2	1.6	2.1	1.1	0.2
1	0.5	0.4	0.1	-0.1	0.5	3.1	5.2	5.9	2.0	-0.1
2	-0.0	0.1	-0.0	0.1	0.9	3.2	6.1	8.1	3.7	0.3
5	-0.4	-0.2	0.0	0.5	0.9	2.7	7.2	10.0	5.0	1.7
10	-0.1	0.5	0.8	0.0	0.8	1.6	6.5	9.4	4.1	0.8
30	-0.3	0.2	0.1	-0.5	-0.8	1.9	6.5	8.3	3.9	1.4
50	-0.4	0.7	0.8	-0.2	-0.1	2.5	6.4	7.7	4.5	2.0
70	-0.5	0.7	1.4	-0.2	0.3	2.8	6.1	6.8	3.7	1.6
100	-0.2	0.4	1.5	1.0	0.7	2.5	5.0	4.7	1.8	0.1
150	-0.3	-0.1	0.4	1.1	1.0	2.8	4.8	3.8	1.5	0.1
200	-0.2	-0.4	-0.2	0.3	1.7	4.2	4.8	3.2	1.0	-0.2
250	-0.2	-0.3	-0.1	0.3	1.6	4.8	4.8	2.6	0.3	0.7
300	-0.2	-0.3	-0.0	0.5	1.1	4.6	4.1	2.2	-0.7	-0.9
400	-0.3	-0.2	-0.1	0.5	1.0	3.7	3.2	1.2	0.0	0.5
500	-0.2	-0.1	-0.0	0.5	1.1	3.6	3.6	1.0	0.4	0.8
700	-0.2	-0.1	0.4	0.6	0.4	2.5	4.0	0.6	0.8	0.7
850	-0.5	-0.5	0.5	1.1	0.3	2.5	4.5	0.6	1.4	1.4
1000	-0.8	-0.9	0.9	0.7	-0.6	0.8	5.5	1.7	1.6	1.8

TABLE 6f

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES FOR
NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JUNE

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.4	0.1	-0.1	-0.1	-0.0	0.2	0.1	0.1	0.3	0.2
1	-0.4	-0.2	-0.1	0.2	0.2	0.5	0.0	-0.1	0.1	0.2
2	-0.1	-0.2	-0.3	0.1	0.3	0.6	-0.0	-0.1	-0.0	0.1
5	0.0	-0.0	-0.1	0.2	0.2	0.4	0.1	0.1	0.1	0.1
10	0.1	0.3	-0.5	-0.3	0.4	0.3	0.6	0.4	0.2	0.2
30	-0.1	-0.0	-0.4	0.2	-0.8	-0.2	0.0	0.4	0.2	0.0
50	-0.1	0.3	-0.3	0.1	-0.8	-0.5	0.0	0.2	0.3	0.2
70	0.0	0.4	-0.2	-0.6	-0.8	-0.3	0.1	0.3	0.4	0.3
100	0.4	0.9	0.7	-0.1	-0.0	0.2	0.7	0.6	0.3	0.2
150	-0.1	0.1	0.7	1.4	0.9	0.8	1.5	1.3	0.6	0.2
200	-0.1	-0.2	0.3	1.1	1.1	1.6	2.2	1.6	0.4	0.1
250	0.1	0.0	-0.1	0.5	0.5	1.1	2.5	1.5	0.2	-0.1
300	0.1	0.1	-0.4	-0.3	-0.3	0.3	1.9	1.7	0.2	0.1
400	0.0	0.1	-0.5	-0.4	-0.6	-0.3	0.9	2.2	0.9	0.5
500	-0.1	0.1	-0.4	-0.2	-0.5	-0.3	0.7	2.2	1.3	0.7
700	-0.5	-0.9	1.5	0.2	-1.2	-1.1	0.1	1.9	1.8	1.6
850	-0.1	-1.3	-3.2	0.3	-2.3	-2.2	-0.4	1.9	1.6	1.7
1000	-0.9	-1.1	-2.5	1.5	-4.1	-4.9	-1.8	2.0	0.6	1.3

TABLE 69 NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES FOR
NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JULY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)										
	5	10	20	30	40	50	60	70	80	85	
0.4	0.2	0.2	-0.1	-0.1	0.1	0.1	-0.1	-0.3	0.0	0.1	
1	0.0	0.1	-0.3	0.1	0.3	0.5	-0.2	-0.2	0.1	0.1	
2	0.1	0.1	-0.3	0.2	0.4	0.6	-0.3	-0.5	-0.1	-0.2	
5	0.0	0.0	-0.2	0.2	0.4	0.3	-0.2	-0.2	-0.1	-0.1	
10	-0.0	-0.0	-0.6	-0.2	0.4	0.3	0.5	1.4	1.1	1.3	
30	-0.1	0.1	0.3	0.3	-0.7	-0.2	0.2	0.5	0.5	0.2	
50	-0.1	0.6	0.3	0.2	-0.9	-0.4	0.1	0.1	0.3	0.3	
70	0.1	0.7	0.1	-0.6	-1.3	-0.2	0.4	0.1	0.2	0.2	
100	0.3	0.3	0.7	0.7	-0.0	0.6	0.7	-0.0	0.1	0.1	
150	-0.4	-0.1	0.4	1.4	1.6	1.8	1.3	0.1	0.1	0.1	
200	-0.0	-0.1	-0.1	1.2	2.0	1.8	1.7	0.2	0.1	0.4	
250	0.1	-0.0	-0.6	0.3	1.3	0.7	1.0	-0.1	-0.5	0.3	
300	0.1	0.0	-0.7	-0.2	0.2	-0.0	0.1	0.2	-0.3	0.0	
400	0.1	0.0	-0.7	-0.3	-0.7	-0.3	-0.5	0.4	0.3	-0.0	
500	-0.1	0.0	-0.6	-0.1	-0.4	-0.2	-0.5	0.4	0.5	-0.1	
700	-0.2	-0.7	-1.9	0.5	0.0	-0.5	-0.7	0.3	0.3	-0.1	
850	0.0	-0.9	-3.4	1.0	0.4	-1.9	-1.6	0.2	0.2	0.2	
1000	-1.0	-0.7	-3.3	3.1	-1.6	-5.6	-3.3	0.3	0.1	0.3	

TABLE 68 NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES FOR
NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE AUGUST

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)										
	5	10	20	30	40	50	60	70	80	85	
0.4	0.4	0.2	-0.0	0.1	0.1	0.1	-0.0	-0.3	-0.1	-0.1	
1	-0.2	-0.0	-0.2	0.2	0.2	0.4	-0.1	-0.6	-0.2	-0.1	
2	0.1	0.1	-0.2	0.1	0.3	0.4	-0.1	-0.8	-0.3	-0.2	
5	0.2	0.1	-0.0	0.1	0.3	0.2	0.0	-0.3	-0.1	-0.1	
10	-0.1	0.1	-0.1	-0.0	0.7	0.4	0.5	1.0	0.6	0.7	
30	-0.3	-0.1	0.1	0.3	-0.5	-0.2	0.2	0.5	0.1	-0.1	
50	-0.3	0.0	0.0	0.5	-0.2	0.2	0.5	0.4	0.2	-0.2	
70	0.0	0.3	0.0	-0.1	-0.1	0.6	0.8	0.4	0.0	-0.3	
100	-0.2	0.1	0.1	0.2	0.4	1.0	1.0	0.5	-0.5	-0.7	
150	-0.5	-0.2	-0.0	0.6	1.3	1.2	1.2	0.7	-1.2	-1.4	
200	-0.3	-0.3	-0.5	0.5	1.5	1.1	1.3	1.2	-1.6	-1.6	
250	-0.1	-0.1	-0.8	-0.2	0.8	1.1	1.6	1.4	-1.3	-1.6	
300	-0.0	-0.0	-0.8	-0.6	0.1	1.0	1.2	0.9	-0.8	-1.6	
400	-0.0	-0.0	-0.8	-0.4	-0.5	0.8	0.9	0.9	-0.3	-1.2	
500	-0.1	-0.0	-0.6	-0.1	-0.1	0.7	1.1	1.1	0.3	-0.4	
700	-0.4	-0.6	-1.6	0.4	0.4	0.3	0.8	1.1	0.2	-0.2	
850	-0.1	-0.7	-3.1	0.6	-0.0	-0.9	0.6	1.6	0.4	0.3	
1000	-0.6	-0.5	-3.1	2.4	-0.2	-2.8	0.7	2.3	1.3	0.6	

TABLE 64 NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES FOR
NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE SEPTEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)										
	5	10	20	30	40	50	60	70	80	85	
0.4	0.2	-0.1	-0.3	-0.1	-0.3	-0.2	0.5	0.6	0.1	-0.1	
1	-0.2	-0.1	0.0	-0.3	-0.5	-0.1	1.3	2.5	2.2	1.1	
2	-0.0	0.2	-0.0	-0.0	-0.2	0.3	1.8	2.7	2.0	0.9	
5	0.1	-0.2	-0.2	0.1	-0.0	0.4	1.6	2.2	1.9	0.7	
10	-0.1	-0.0	-0.8	-0.5	0.2	1.2	2.5	3.3	2.0	1.3	
30	-0.2	-0.1	-0.5	0.1	-0.4	0.8	2.1	2.4	1.5	0.6	
50	-0.3	0.2	-0.5	-0.1	-0.5	1.0	1.9	1.9	1.5	0.8	
70	-0.1	0.1	-0.3	-0.5	-0.4	1.0	1.8	1.7	1.3	0.7	
100	-0.4	0.0	0.6	0.0	0.4	0.6	1.6	1.3	1.1	0.4	
150	-0.5	-0.2	0.3	0.7	0.7	1.1	2.0	1.4	1.0	0.5	
200	-0.2	-0.2	-0.0	1.2	1.2	3.4	2.9	1.9	1.1	0.8	
250	0.1	-0.0	-0.4	1.0	1.5	4.5	3.3	2.3	1.4	0.5	
300	0.2	0.1	-0.5	0.6	1.4	3.6	2.5	1.5	1.1	0.2	
400	0.1	-0.0	-0.6	0.5	1.2	2.3	2.0	0.9	1.1	0.6	
500	-0.1	-0.1	-0.5	0.6	1.3	2.0	2.3	1.2	1.4	0.9	
700	-0.1	-0.3	-0.4	1.1	0.9	1.3	2.5	1.6	1.6	0.8	
850	-0.2	-0.5	-0.9	1.7	0.5	0.7	3.3	2.2	1.8	0.7	
1000	-0.5	-0.7	-0.2	3.0	0.4	0.2	4.3	3.0	1.8	0.8	

TABLE 65 NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES FOR
NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE OCTOBER

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)										
	5	10	20	30	40	50	60	70	80	85	
0.4	0.0	-0.7	-0.1	-0.4	-0.1	3.8	13.3	18.7	13.4	7.6	
1	-0.7	-0.5	-0.3	-1.0	0.8	11.2	31.2	44.8	34.5	20.0	
2	-0.5	-0.5	-0.3	-0.8	1.1	12.3	33.2	44.9	32.1	18.0	
5	-0.2	-0.3	-0.1	-0.4	1.0	7.9	21.0	26.4	15.7	8.0	
10	0.1	-0.0	-0.2	-1.3	0.3	3.8	13.4	15.7	7.3	3.0	
30	-0.2	-0.1	-0.5	-0.4	0.5	3.6	8.9	8.6	4.1	2.1	
50	-0.2	-0.0	-0.4	-0.5	0.8	3.8	7.2	5.8	2.7	1.5	
70	-0.3	0.1	-0.5	-1.0	0.7	3.7	6.3	4.3	2.0	1.2	
100	-0.2	0.1	-0.2	-0.3	1.2	3.6	5.4	3.0	1.6	1.2	
150	-0.1	0.1	-0.3	0.4	2.1	4.8	5.4	1.8	0.9	0.9	
200	0.1	-0.0	-0.0	1.1	3.7	7.2	5.0	1.0	0.4	0.7	
250	0.1	0.1	0.3	1.4	4.0	7.7	4.4	0.2	0.0	0.3	
300	0.1	0.1	0.3	1.3	3.5	6.4	2.9	-0.1	0.1	0.0	
400	0.0	0.0	0.2	0.9	2.5	4.6	2.7	1.0	0.5	0.3	
500	-0.1	-0.1	0.1	0.6	1.8	4.2	3.8	2.2	0.9	0.5	
700	0.1	0.1	0.4	0.4	1.0	4.0	5.6	2.7	1.2	1.1	
850	-0.4	-0.2	0.8	0.8	1.0	4.4	7.2	3.0	1.2	1.4	
1000	-0.7	-0.2	1.6	1.1	1.2	4.3	7.4	2.7	1.1	1.5	

TABLE 66 NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES FOR
NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE NOVEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)										
	5	10	20	30	40	50	60	70	80	85	
0.4	-0.1	-0.2	-1.4	-0.0	2.2	11.1	28.8	39.4	30.1	15.7	
1	-0.2	-0.1	-0.8	1.9	10.0	26.7	64.5	88.3	68.3	37.3	
2	-0.2	-0.1	-1.2	1.6	9.1	27.2	66.9	90.2	68.1	36.2	
5	-0.0	0.1	-0.9	0.8	6.0	22.3	52.3	66.0	42.6	20.5	
10	0.1	0.0	-0.8	-0.8	1.9	18.0	40.8	38.9	18.5	7.7	
30	-0.2	-0.2	-0.4	0.2	1.6	12.1	26.0	23.8	8.4	3.2	
50	-0.2	0.0	-0.4	-0.2	1.4	9.8	18.7	15.2	5.5	2.5	
70	0.2	0.1	-1.1	-1.5	1.3	8.9	14.9	10.8	3.8	2.0	
100	-0.4	0.2	-0.7	-0.6	1.1	7.6	11.9	7.1	2.2	1.2	
150	-0.4	-0.2	-0.9	-0.1	1.6	9.0	10.0	4.3	1.0	0.7	
200	-0.2	-0.3	-0.1	1.4	3.9	11.6	9.2	2.6	0.4	0.4	
250	-0.1	-0.2	0.5	2.3	5.4	11.3	8.1	1.6	0.1	0.3	
300	-0.1	-0.1	0.7	2.2	5.1	9.2	5.3	0.7	0.1	0.4	
400	-0.1	-0.0	0.6	1.6	4.2	6.8	3.6	1.0	1.0	0.7	
500	-0.1	-0.0	0.4	0.9	3.8	6.6	4.8	1.6	1.2	0.8	
700	0.1	0.1	0.4	0.2	3.5	7.4	7.4	2.3	1.5	0.8	
850	-0.4	-0.1	0.9	0.4	3.9	10.0	10.6	3.6	1.4	0.7	
1000	-1.0	-0.2	1.3	0.1	3.4	11.1	13.3	4.5	0.9	1.4	

TABLE 67 NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES FOR
NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE DECEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)										
	5	10	20	30	40	50	60	70	80	85	
0.4	0.8	0.8	0.3	-0.2	2.7	11.1	16.8	15.2	7.7	3.3	
1	-0.2	-0.0	0.8	7.3	20.4	31.3	41.8	45.0	27.2	13.3	
2	0.2	0.4	0.5	6.0	20.6	34.1	44.3	45.0	27.1	13.1	
5	0.4	0.5	0.1	3.2	14.0	28.7	39.5	37.0	22.2	10.6	
10	0.2	0.6	0.1	0.7	8.5	27.1	39.0	28.1	15.5	7.3	
30	-0.1	0.3	-0.4	0.6	5.2	19.8	27.9	22.4	11.1	4.6	
50	-0.2	0.5	0.1	0.4	4.1	14.9	20.5	16.5	9.1	4.1	
70	-0.4	0.3	-1.0	-0.7	3.5	12.6	16.2	12.3	7.7	4.1	
100	0.4	0.6	-0.6	-0.2	3.3	10.3	12.1	8.7	5.9	2.5	
150	-0.5	-0.8	-1.3	0.9	4.7	10.0	9.2	5.2	4.6	2.3	
200	-0.2	-1.0	-1.0	1.8	8.2	11.4	7.3	2.8	2.8	2.0	
250	-0.2	-0.6	-0.2	2.1	9.4	10.9	5.6	0.6	1.0	2.0	
300	-0.4	-0.6	0.2	2.0	7.6	8.9	3.6	-0.3	-0.4	1.4	
400	-0.4	-0.4	0.3	1.7	5.3	7.0	2.8	0.2	-0.7	0.1	
500	-0.3	-0.3	0.3	1.2	5.2	7.6	3.8	1.1	-0.1	0.3	
700	-0.0	0.1	0.3	0.9	5.7	8.6	5.7	1.8	0.3	0.2	
850	-0.7	0.1	0.7	1.0	7.2	13.3	9.1	1.6	0.7	1.0	
1000	-1.8	-0.2	1.4	0.6	7.2	15.1	11.1	1.3	0.7	1.6	

TABLE 1a NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE JANUARY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.3	0.2	0.1	0.8	6.7	29.2	53.0	53.3	34.7	20.2
1	-0.2	-0.1	0.0	2.7	16.4	53.9	100.3	113.2	85.8	52.4
2	-0.0	0.0	-0.1	2.6	19.2	64.6	118.1	131.2	94.4	55.7
5	0.1	0.1	-0.3	1.1	12.6	49.5	96.2	114.4	83.0	46.8
10	0.0	0.1	0.1	0.5	5.9	27.8	56.3	53.3	30.0	14.5
30	0.0	0.1	0.1	0.2	3.3	14.8	31.6	31.6	17.8	7.8
50	0.0	0.1	0.1	0.2	2.5	10.0	19.9	19.9	12.1	5.8
70	0.0	0.2	0.1	0.0	2.2	7.9	13.9	12.8	8.7	4.9
100	0.2	0.3	0.1	0.2	2.3	6.5	10.3	8.5	4.7	2.6
150	-0.3	-0.3	-0.3	0.6	3.1	6.4	7.3	4.5	2.7	2.2
200	-0.2	-0.3	0.1	1.4	4.1	6.5	5.8	2.3	0.8	0.8
250	-0.2	-0.2	0.3	1.7	4.4	5.3	3.7	1.1	-0.0	0.0
300	-0.3	-0.2	0.3	1.5	3.6	3.8	2.0	0.5	-0.2	0.6
400	-0.2	-0.2	0.2	1.0	2.5	2.9	1.2	-0.0	0.1	1.2
500	-0.2	-0.2	0.1	0.8	2.5	3.2	1.2	-0.3	0.3	1.0
700	-0.1	-0.1	0.0	0.6	2.4	3.2	1.5	-0.4	0.6	0.9
850	-0.2	-0.1	0.0	0.5	1.9	3.5	2.1	-0.9	0.5	2.7
1000	-0.4	-0.1	0.1	0.4	1.3	3.2	3.0	-1.1	-0.4	4.4

TABLE 7b NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE FEBRUARY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.2	0.1	-0.1	-0.1	0.5	6.7	19.5	26.6	22.2	13.0
1	-0.2	-0.1	-0.2	0.1	2.2	14.9	38.4	51.3	42.1	24.1
2	0.0	0.1	-0.2	0.0	2.5	17.3	44.9	64.5	57.1	33.7
5	0.1	0.1	-0.1	-0.1	1.5	11.8	33.1	55.2	56.4	35.4
10	0.0	0.1	0.2	0.1	-0.2	5.0	20.4	27.0	26.2	15.8
30	0.0	0.0	0.0	-0.0	0.2	3.7	11.9	14.7	9.8	4.7
50	-0.0	-0.0	0.1	-0.2	0.1	2.6	6.5	7.1	5.2	2.6
70	0.0	0.1	0.1	-0.3	0.1	2.2	4.1	3.9	3.2	1.6
100	0.1	0.1	0.0	-0.1	0.2	1.8	2.5	2.0	2.0	0.9
150	-0.2	-0.2	-0.2	0.2	0.9	2.1	1.8	1.1	1.4	0.7
200	-0.2	-0.2	-0.1	0.8	2.1	2.3	1.5	0.7	0.6	0.0
250	-0.2	-0.2	0.0	1.3	2.7	2.2	1.4	0.6	0.2	-0.2
300	-0.2	-0.2	0.1	1.3	2.2	1.9	1.2	0.5	-0.0	-0.3
400	-0.2	-0.2	0.1	1.0	1.5	2.0	1.3	0.8	-0.2	-0.5
500	-0.2	-0.1	0.1	0.8	1.6	2.5	1.5	0.8	-0.3	-0.4
700	-0.1	-0.1	0.0	0.6	1.8	2.5	1.9	1.0	-0.0	0.3
850	-0.3	-0.1	-0.0	0.6	1.8	2.6	2.6	1.5	0.8	1.5
1000	-0.4	-0.1	-0.1	0.2	0.9	1.9	3.3	2.7	1.0	2.4

TABLE 7c NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE MARCH

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.3	-0.1	0.0	-0.1	1.1	5.1	10.7	12.0	7.3	3.6
1	-0.1	-0.1	-0.0	-0.3	3.6	16.5	31.7	34.5	21.6	12.3
2	-0.1	-0.1	-0.1	-0.6	3.1	16.6	33.2	36.2	21.0	10.7
5	0.0	0.0	-0.1	-0.5	1.9	10.6	22.1	24.2	14.3	7.3
10	0.0	0.0	0.5	0.5	0.6	3.9	11.9	15.0	3.7	-1.7
30	0.0	0.1	0.1	-0.0	-0.0	2.2	8.5	9.8	2.8	-0.1
50	0.0	0.0	0.3	0.1	0.1	2.0	6.2	4.7	-1.4	-2.2
70	0.0	0.1	0.4	0.1	0.2	2.0	4.8	1.7	-3.4	-3.0
100	0.0	0.2	0.4	0.1	0.2	1.8	3.6	0.1	-4.5	-4.3
150	-0.0	-0.1	0.0	0.3	0.5	2.2	2.8	-0.7	-4.2	-3.8
200	0.0	-0.1	0.1	0.5	0.9	2.2	2.3	-0.7	-3.7	-3.3
250	-0.0	-0.1	0.1	0.4	1.1	2.2	1.9	-0.1	-2.6	-2.8
300	-0.1	-0.1	0.1	0.3	0.7	2.1	1.2	0.3	-0.4	-0.9
400	-0.1	-0.1	-0.0	0.2	0.4	2.0	0.9	0.7	1.6	1.0
500	-0.1	-0.1	-0.1	0.2	0.6	2.3	1.1	1.3	2.8	1.8
700	-0.1	-0.1	0.1	0.0	0.5	2.0	1.2	1.8	3.9	3.0
850	-0.2	-0.1	0.1	-0.2	0.3	1.8	1.2	3.1	4.9	3.5
1000	-0.4	-0.1	0.2	-0.3	0.1	0.8	1.5	4.2	5.5	4.3

TABLE 7d NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE APRIL

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.3	-0.3	-0.1	-0.0	0.1	0.4	1.3	1.4	1.8	0.5
1	-0.0	-0.1	-0.2	-0.2	0.2	2.4	5.3	5.3	3.6	0.4
2	-0.1	-0.2	-0.2	-0.2	0.0	2.1	5.6	6.6	5.1	0.8
5	-0.1	-0.2	-0.1	-0.2	0.1	1.5	5.1	7.2	4.8	1.8
10	0.0	0.0	0.3	0.3	0.3	0.7	3.9	6.2	3.3	0.7
30	0.0	0.0	0.1	0.2	0.2	0.9	3.7	5.2	3.1	1.3
50	-0.0	-0.0	0.2	0.3	0.2	1.0	3.6	5.6	4.0	2.0
70	0.0	0.0	0.4	0.3	0.2	1.0	3.5	5.2	3.4	1.6
100	-0.1	-0.0	0.6	0.7	0.1	0.7	3.1	3.9	1.6	0.1
150	-0.2	-0.1	0.1	0.9	0.1	0.8	3.1	3.3	0.9	0.0
200	-0.1	-0.1	-0.1	0.6	-0.0	1.2	2.9	3.1	0.5	-0.2
250	-0.1	-0.1	-0.1	0.3	-0.1	1.3	2.6	2.8	0.1	-0.7
300	-0.1	-0.1	-0.2	0.2	-0.1	1.2	1.7	2.0	-0.1	-0.7
400	-0.1	-0.1	-0.1	0.3	-0.1	0.9	1.1	0.6	0.5	0.6
500	-0.1	-0.1	-0.1	0.2	-0.0	1.0	1.2	0.4	0.9	1.0
700	-0.1	-0.1	-0.0	0.3	0.0	0.7	1.0	0.2	1.3	0.8
850	-0.3	-0.2	-0.1	0.0	0.0	0.2	0.5	0.6	1.9	1.4
1000	-0.5	-0.3	-0.1	-0.4	-0.1	-0.6	-0.0	0.7	1.3	1.8

TABLE 7e NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE MAY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.3	0.1	-0.2	-0.1	0.1	0.1	-0.0	-0.0	-0.0	0.0
1	-0.1	-0.1	-0.2	-0.2	0.1	-0.0	-0.3	-0.4	-0.0	0.3
2	0.0	-0.1	-0.3	-0.2	0.2	0.1	-0.3	-0.4	0.1	0.4
5	0.1	0.0	-0.2	-0.0	0.1	0.0	-0.2	-0.4	0.1	0.3
10	0.0	0.1	0.3	0.3	0.1	0.0	0.4	0.3	-0.1	-0.1
30	-0.0	-0.0	0.1	0.1	-0.0	-0.1	-0.0	0.1	-0.2	-0.1
50	0.0	0.0	0.1	0.3	0.2	-0.1	-0.1	0.0	-0.1	-0.1
70	-0.0	-0.0	0.1	0.4	0.3	-0.1	-0.1	0.0	-0.1	0.0
100	-0.0	0.0	0.3	0.9	0.3	-0.3	-0.1	-0.0	-0.3	-0.1
150	-0.1	-0.1	-0.1	0.9	0.1	-0.3	0.2	-0.1	-0.5	-0.3
200	0.0	-0.0	-0.1	0.4	-0.3	0.1	0.4	-0.2	-0.7	-0.6
250	-0.0	-0.0	-0.2	0.1	-0.5	0.4	0.4	-0.2	-0.8	-1.0
300	-0.0	-0.1	-0.4	-0.1	-0.4	0.3	0.2	-0.2	-0.5	-0.5
400	-0.0	-0.1	-0.4	-0.2	-0.2	0.2	0.0	-0.0	-0.2	0.2
500	-0.0	-0.1	-0.3	-0.1	-0.1	0.2	0.1	0.1	0.2	0.4
700	-0.1	-0.1	-0.3	-0.0	-0.3	-0.4	-0.1	0.3	0.3	0.5
850	-0.3	-0.4	-0.7	-0.4	-0.7	-1.2	-0.4	0.2	0.5	0.8
1000	-0.4	-0.4	-0.8	-0.8	-1.1	-2.2	-1.0	-0.5	-0.3	0.5

TABLE 7f NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE JUNE

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.2	0.0	-0.1	-0.1	-0.1	0.1	-0.0	-0.1	0.1	0.2
1	-0.3	-0.2	-0.2	-0.1	0.1	0.3	-0.1	-0.3	0.0	0.2
2	-0.2	-0.2	-0.3	-0.2	0.1	0.4	-0.1	-0.3	-0.1	0.1
5	-0.0	-0.1	-0.2	-0.1	0.0	0.3	0.0	-0.1	0.1	0.1
10	0.0	0.0	0.1	0.2	0.2	0.0	0.3	0.4	0.6	0.4
30	-0.0	-0.0	0.0	0.1	0.1	0.0	0.1	0.3	0.3	0.0
50	-0.0	0.0	0.2	0.2	0.2	-0.1	0.0	0.1	0.3	0.3
70	-0.0	-0.0	0.2	-0.1	0.2	-0.0	0.1	0.1	0.4	0.4
100	0.0	0.1	0.3	0.4	0.2	-0.1	0.3	0.3	0.4	0.3
150	0.0	-0.0	-0.1	0.7	-0.2	-0.1	0.7	0.6	0.7	0.3
200	0.1	-0.0	-0.3	0.4	-0.4	0.5	1.3	1.0	0.8	0.3
250	0.0	-0.0	-0.4	0.1	-0.3	0.5	1.3	1.2	0.9	0.1
300	-0.0	-0.0	-0.5	-0.2	-0.2	0.2	0.7	0.9	1.0	0.3
400	0.0	-0.0	-0.5	-0.3	-0.1	-0.1	0.1	0.7	1.0	0.5
500	0.0	0.0	-0.4	-0.2	-0.1	-0.2	-0.1	0.6	1.2	0.6
700	0.0	-0.1	-0.8	-0.4	-0.4	-0.5	-0.3	0.5	1.6	1.4
850	-0.3	-0.4	-1.8	-0.9	-0.9	-1.1	-0.6	0.5	1.3	1.6
1000	-0.5	-0.3	-1.7	-1.4	-1.6	-2.0	-1.0	0.5	0.2	1.2

TABLE 7₉ NORTHWARD FLUX OF HEAT (°K M/S) BY THE STANDING EDDIES OF THE ZONAL WAVENUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE JULY

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.2	0.1	-0.1	-0.0	-0.0	0.0	-0.2	-0.3	0.0	0.1
1	-0.3	-0.2	-0.2	-0.1	0.1	0.3	-0.3	-0.4	-0.0	0.1
2	-0.1	-0.1	-0.2	-0.1	0.1	0.2	-0.3	-0.6	-0.2	-0.2
5	0.0	-0.0	-0.2	-0.1	0.0	0.1	-0.2	-0.3	-0.1	-0.1
10	0.0	-0.0	-0.0	0.1	0.1	-0.0	0.4	0.9	1.3	1.4
30	-0.0	-0.0	0.1	0.1	0.1	0.1	0.2	0.4	0.3	0.1
50	-0.0	-0.0	0.1	0.2	0.3	0.1	0.2	0.1	0.2	0.2
70	-0.0	-0.0	0.1	-0.1	-0.0	0.0	0.3	0.1	0.0	0.1
100	0.0	0.1	0.4	0.1	-0.1	0.2	0.5	0.1	-0.2	-0.0
150	0.0	0.0	-0.0	0.0	-0.1	0.3	0.8	0.3	-0.1	0.1
200	0.1	0.1	-0.4	-0.1	-0.2	0.3	1.3	0.7	-0.3	0.3
250	0.1	0.0	-0.6	-0.5	-0.3	0.1	0.9	0.7	-0.6	0.2
300	0.0	0.0	-0.7	-0.8	-0.3	-0.1	0.2	0.5	-0.4	0.0
400	0.1	0.0	-0.6	-0.8	-0.2	-0.1	-0.1	0.2	0.1	-0.1
500	0.1	0.1	-0.4	-0.6	-0.2	-0.2	-0.1	0.1	0.3	-0.1
700	0.0	-0.0	-0.9	-0.9	-0.4	-0.2	-0.2	-0.1	0.2	0.0
850	-0.2	-0.2	-1.8	-1.5	-1.0	-0.6	-0.2	-0.2	-0.1	0.3
1000	-0.4	0.1	-1.6	-2.1	-2.1	-1.6	-0.3	-0.3	-0.1	0.5

TABLE 7₈ NORTHWARD FLUX OF HEAT (°K M/S) BY THE STANDING EDDIES OF THE ZONAL WAVENUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE AUGUST

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.2	0.1	-0.1	0.1	0.1	0.1	-0.0	-0.3	-0.2	-0.1
1	-0.1	0.0	-0.1	-0.1	0.1	0.2	-0.2	-0.6	-0.3	-0.1
2	0.1	0.1	-0.1	-0.1	0.1	0.2	-0.2	-0.7	-0.6	0.3
5	0.2	0.1	-0.1	-0.0	0.1	0.1	-0.1	-0.4	-0.3	-0.2
10	0.0	0.0	0.0	0.2	0.1	-0.1	0.2	0.8	0.8	0.8
30	-0.0	-0.0	0.1	0.1	0.0	-0.0	0.1	0.5	0.3	-0.1
50	-0.0	-0.0	0.1	0.3	0.4	0.1	0.2	0.3	0.2	-0.2
70	-0.0	-0.0	0.1	0.1	0.3	0.2	0.2	0.4	0.0	-0.3
100	0.0	-0.0	0.3	-0.1	0.1	0.3	0.3	0.3	-0.6	0.7
150	-0.0	-0.0	-0.1	-0.3	-0.0	0.2	0.2	0.4	-1.2	-1.4
200	0.1	0.0	-0.5	-0.5	-0.2	-0.0	0.0	0.5	-1.4	1.5
250	0.1	0.0	-0.6	-0.9	-0.3	-0.1	-0.1	0.6	-1.2	-1.6
300	0.1	0.0	-0.7	-1.1	-0.3	-0.1	-0.0	0.5	-1.0	-1.7
400	0.0	0.0	-0.6	-1.0	-0.2	-0.1	0.0	0.4	-0.6	-1.2
500	0.1	0.0	-0.4	-0.9	-0.2	-0.1	0.0	0.5	0.0	-0.4
700	-0.0	-0.0	-0.9	-1.0	-0.3	-0.1	0.1	0.3	0.1	0.2
850	-0.2	-0.1	-1.8	-1.5	-0.7	-0.4	0.1	0.2	0.2	0.3
1000	-0.3	0.2	-1.8	-2.1	-1.2	-1.0	0.2	0.2	1.2	0.7

TABLE 7₁ NORTHWARD FLUX OF HEAT (°K M/S) BY THE STANDING EDDIES OF THE ZONAL WAVENUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE SEPTEMBER

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.2	0.1	-0.2	-0.1	-0.0	-0.1	-0.1	-0.2	-0.2	-0.2
1	-0.1	-0.1	-0.1	-0.2	-0.2	-0.1	0.4	1.2	1.4	0.9
2	0.0	-0.0	-0.2	-0.2	-0.2	0.0	0.5	1.2	1.2	0.7
5	0.2	0.1	-0.1	-0.1	-0.1	-0.0	0.2	0.8	1.0	0.6
10	0.0	0.0	0.1	-0.0	-0.1	-0.1	0.2	1.5	1.8	1.3
30	-0.0	-0.0	0.0	-0.0	0.0	0.0	0.2	0.9	0.9	0.5
50	-0.0	-0.0	0.1	-0.1	0.0	-0.0	0.1	0.8	1.0	0.8
70	-0.0	-0.0	0.1	-0.3	-0.0	0.0	0.2	0.8	0.9	0.6
100	0.0	0.0	0.0	-0.3	0.1	-0.1	0.2	0.7	0.7	0.4
150	0.0	0.0	-0.2	-0.0	0.1	0.1	0.6	1.1	0.9	0.6
200	0.1	0.1	-0.2	0.1	0.2	1.1	1.0	1.6	1.0	0.8
250	0.1	0.0	-0.3	-0.0	0.2	1.6	1.2	1.7	0.9	0.5
300	0.0	0.0	-0.3	-0.1	0.3	1.4	0.9	1.2	0.7	0.1
400	0.0	0.0	-0.3	-0.2	0.3	1.0	0.6	0.8	0.9	0.5
500	0.0	0.0	-0.2	-0.1	0.3	0.9	0.6	0.9	1.1	0.8
700	0.0	-0.0	-0.4	-0.3	-0.0	0.4	0.4	0.8	1.2	0.7
850	-0.2	-0.2	-0.9	-0.6	-0.3	-0.1	0.4	1.1	1.3	0.7
1000	-0.5	-0.2	-1.1	-0.8	-0.6	-0.5	0.5	1.5	1.2	0.7

TABLE 7₂ NORTHWARD FLUX OF HEAT (°K M/S) BY THE STANDING EDDIES OF THE ZONAL WAVENUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE OCTOBER

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.1	-0.0	-0.1	-0.6	-0.6	2.7	10.9	16.0	12.3	7.3
1	-0.6	-0.4	-0.2	-1.0	0.4	9.7	27.4	41.0	32.6	19.6
2	-0.3	-0.2	-0.3	-1.2	0.4	10.7	29.1	40.0	29.8	17.5
5	-0.0	-0.1	-0.2	-0.9	0.2	6.5	17.0	23.4	13.8	7.6
10	0.0	0.0	0.1	-0.2	0.0	2.1	8.1	9.5	5.1	2.6
30	-0.0	-0.0	-0.0	-0.1	0.2	1.2	3.7	4.1	3.0	2.0
50	-0.0	-0.0	-0.0	-0.2	0.2	1.1	2.8	2.7	2.0	1.4
70	-0.0	-0.1	-0.1	-0.3	0.2	1.0	2.4	2.0	1.5	1.1
100	0.0	-0.0	-0.0	0.1	0.4	0.9	2.2	1.8	1.6	1.2
150	0.0	-0.0	-0.2	0.4	0.8	1.6	2.3	1.4	1.3	1.1
200	0.1	-0.0	-0.2	0.4	1.0	2.4	2.3	1.1	1.2	0.9
250	0.0	0.0	-0.1	0.9	1.0	2.5	2.0	0.7	1.1	0.5
300	-0.0	-0.0	-0.1	0.3	0.8	2.0	1.3	0.2	0.8	0.3
400	-0.0	-0.0	-0.1	0.1	0.6	1.5	1.0	0.3	0.6	0.3
500	-0.0	-0.0	-0.1	0.1	0.5	1.5	1.2	0.7	0.6	0.4
700	-0.0	-0.0	-0.1	-0.0	0.3	1.2	1.2	0.7	1.0	1.0
850	-0.2	-0.2	-0.3	-0.1	0.2	0.9	1.3	0.7	1.3	1.5
1000	-0.3	0.1	-0.4	-0.1	0.1	0.5	1.3	0.9	1.4	1.7

TABLE 7₃ NORTHWARD FLUX OF HEAT (°K M/S) BY THE STANDING EDDIES OF THE ZONAL WAVENUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE NOVEMBER

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.2	0.0	-1.2	-0.0	1.6	10.4	27.0	37.9	29.8	15.6
1	-0.2	-0.1	-0.3	1.6	7.8	24.2	61.3	85.8	68.3	37.5
2	-0.0	-0.0	-0.9	1.1	7.2	24.8	62.0	86.4	67.3	36.2
5	0.2	0.2	-1.0	0.3	5.0	20.0	46.4	60.9	40.8	20.3
10	0.0	0.1	-0.4	0.1	2.0	15.4	34.5	32.2	16.0	7.3
30	0.0	0.0	-0.0	0.1	1.2	9.3	19.3	17.9	6.7	3.0
50	-0.0	-0.0	-0.0	-0.1	0.9	7.1	13.4	11.2	4.4	2.4
70	0.0	0.0	-0.2	-0.2	0.7	6.2	10.9	7.9	3.3	2.0
100	0.0	-0.0	-0.1	-0.0	0.7	5.4	8.1	5.8	2.3	1.2
150	-0.1	-0.1	-0.3	0.3	1.0	5.6	6.3	3.9	1.5	0.7
200	0.1	-0.0	-0.1	0.7	1.7	6.0	4.8	3.1	1.3	0.4
250	0.0	-0.0	0.1	0.8	2.0	5.1	3.4	2.3	1.0	0.4
300	-0.0	-0.0	0.2	0.7	1.8	3.8	1.8	1.4	0.7	0.5
400	0.0	-0.0	0.1	0.3	1.4	2.7	1.1	0.6	1.1	0.8
500	-0.1	-0.0	0.1	0.2	1.3	2.8	1.4	0.6	1.4	0.9
700	-0.0	-0.0	0.0	0.0	1.1	2.7	1.7	0.8	1.5	0.8
850	-0.2	-0.1	0.0	0.0	1.1	3.1	2.3	1.2	1.3	0.8
1000	-0.3	0.1	0.1	0.1	0.9	2.9	3.1	1.2	0.7	1.5

TABLE 7₄ NORTHWARD FLUX OF HEAT (°K M/S) BY THE STANDING EDDIES OF THE ZONAL WAVENUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE DECEMBER

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.4	0.3	0.3	0.4	1.0	5.0	9.2	10.5	6.2	3.1
1	-0.2	-0.2	0.5	2.6	4.2	11.3	28.0	37.0	24.6	12.8
2	0.0	-0.0	0.3	2.5	5.4	12.6	26.6	35.4	24.3	12.6
5	0.2	0.1	-0.1	1.9	4.9	11.9	21.5	28.4	20.5	10.3
10	0.0	0.1	-0.1	0.7	2.8	10.8	19.8	20.8	14.3	7.2
30	0.0	0.0	0.0	0.2	2.3	8.4	14.0	17.5	11.1	4.8
50	-0.0	0.0	0.1	0.1	1.6	5.9	10.2	13.8	9.4	4.2
70	0.0	0.1	0.1	-0.0	1.3	4.7	8.6	11.3	8.4	4.3
100	0.2	0.3	0.2	0.1	1.2	3.6	6.9	9.2	7.3	3.0
150	-0.2	-0.2	-0.2	0.6	1.6	3.3	5.7	7.2	6.1	2.8
200	0.0	-0.1	-0.1	1.1	2.5	3.7	5.1	5.8	4.7	2.5
250	-0.0	-0.1	0.1	1.2	2.8	3.5	3.8	3.7	3.1	2.6
300	-0.1	-0.1	0.2	1.0	2.5	2.6	2.0	1.5	1.2	1.8
400	-0.1	-0.2	0.1	0.7	2.0	1.7	0.9	0.6	-0.1	0.2
500	-0.2	-0.2	0.1	0.5	1.8	1.7	1.0	0.8	-0.0	0.3
700	-0.1	-0.1	0.0	0.3	1.5	1.4	1.5	1.2	0.0	0.0
850	-0.4	-0.1	0.0	0.3	1.2	1.5	2.4	1.0	0.4	0.8
1000	0.6	-0.1	0.1	0.3	0.8	1.0	3.1	0.0	-0.4	1.4

TABLE 8a

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF
THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE
JANUARY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.1	-0.1	-0.1	0.4	3.8	8.2	11.4	7.8	1.5	0.3
1	-0.0	0.1	0.3	1.3	6.8	13.7	19.5	11.8	1.6	0.4
2	-0.1	0.1	0.2	1.4	7.8	17.0	24.4	17.4	3.1	0.5
5	-0.2	0.0	0.2	1.4	5.9	14.0	23.4	19.7	4.4	0.6
10	-0.0	0.0	0.0	0.5	3.9	14.0	27.3	27.5	10.0	2.0
30	-0.0	-0.0	0.0	0.3	2.3	8.2	16.3	14.8	3.9	0.6
50	-0.1	-0.1	-0.1	-0.4	1.8	7.9	13.4	7.7	1.0	0.0
70	-0.1	-0.2	-0.5	-0.7	1.6	7.8	11.3	3.9	-0.5	-0.2
100	-0.5	-0.2	-0.3	-0.7	1.2	5.7	7.1	0.7	-1.2	0.5
150	-0.4	-0.1	-0.3	-0.4	1.4	5.4	4.3	-1.8	-1.4	-0.4
200	-0.3	-0.2	-0.4	-0.5	2.0	5.8	3.8	-2.8	-1.6	-0.4
250	-0.3	-0.2	-0.3	-0.6	2.3	5.6	3.3	-2.1	-1.2	-0.3
300	-0.2	-0.2	-0.2	-0.6	1.7	4.2	2.4	-0.7	-0.7	-0.2
400	-0.1	-0.1	-0.1	-0.3	0.9	3.0	2.1	0.6	-0.1	-0.1
500	-0.1	-0.0	-0.1	-0.1	1.2	3.7	2.7	1.2	0.1	0.0
700	-0.3	-0.1	-0.1	0.1	2.3	5.5	4.5	0.8	0.5	0.3
850	-0.4	-0.1	0.1	0.2	3.3	8.9	6.8	0.6	0.3	0.1
1000	-0.6	-0.3	0.2	0.1	3.4	10.3	8.5	0.1	1.0	0.2

TABLE 8b

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF
THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE
FEBRUARY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.0	0.0	-0.0	-0.1	0.8	2.7	5.1	2.3	-0.6	-0.3
1	-0.1	0.0	0.1	0.1	1.6	6.2	8.7	3.9	-0.4	-0.2
2	-0.1	0.1	0.1	0.1	2.1	8.2	12.8	7.8	0.9	-0.1
5	-0.1	0.1	0.1	0.2	1.8	7.4	14.7	11.6	2.5	0.3
10	-0.0	-0.0	-0.1	-0.2	1.3	9.4	21.5	16.0	8.3	2.1
30	-0.0	-0.1	-0.1	0.1	1.5	8.2	21.0	20.0	5.9	1.0
50	-0.1	-0.2	-0.2	-0.2	1.4	8.6	18.3	15.2	3.9	0.5
70	-0.1	-0.1	-0.6	-0.5	1.3	8.3	16.0	11.4	2.8	0.3
100	-0.2	-0.1	-0.4	-0.5	0.9	6.8	12.2	7.6	1.0	-0.1
150	-0.3	-0.1	-0.3	-0.2	1.2	6.3	9.1	4.8	-0.1	-0.3
200	-0.3	-0.1	-0.4	-0.5	1.9	6.7	7.0	2.6	-0.2	0.1
250	-0.3	-0.1	-0.4	-0.8	2.0	6.6	5.5	1.1	-0.4	0.0
300	-0.2	-0.1	-0.3	-0.7	1.4	5.1	4.2	0.8	-0.2	0.1
400	-0.1	-0.1	-0.2	-0.4	0.7	3.9	4.0	2.5	0.4	0.3
500	-0.1	-0.0	-0.1	-0.2	1.0	4.2	4.6	3.3	0.8	0.2
700	-0.2	-0.1	0.0	0.0	1.6	4.8	5.6	3.4	0.2	0.2
850	-0.4	-0.2	0.3	0.1	2.1	7.8	8.8	4.4	0.5	0.2
1000	-0.5	-0.2	0.5	-0.2	2.1	9.0	11.3	5.6	1.2	0.3

TABLE 8c

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF
THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE
MARCH

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.0	0.0	-0.0	0.1	0.2	0.8	2.7	2.8	0.4	0.1
1	0.1	0.0	0.2	0.5	0.3	0.4	1.8	2.4	0.2	0.2
2	0.1	0.1	0.1	0.6	0.5	1.6	4.6	4.8	0.5	0.2
5	0.1	0.0	0.0	0.3	0.5	2.3	6.7	6.3	1.0	0.2
10	-0.0	0.0	-0.1	-0.3	0.4	2.7	7.2	6.9	2.3	0.5
30	-0.0	-0.0	-0.1	-0.0	0.4	1.5	5.6	5.3	1.4	0.2
50	-0.0	-0.0	-0.1	-0.3	0.3	1.5	5.0	3.4	0.4	0.0
70	-0.0	0.0	-0.2	-0.6	0.3	1.7	4.7	2.7	-0.0	-0.1
100	-0.1	0.1	-0.2	-0.5	0.0	1.4	3.2	0.7	-0.6	-0.2
150	-0.3	-0.1	-0.3	-0.1	0.5	2.0	2.7	-0.2	-1.0	-0.3
200	-0.3	-0.2	-0.5	0.2	1.4	3.2	2.8	-1.1	-0.9	-0.2
250	-0.3	-0.2	-0.4	0.5	1.6	4.2	3.2	-1.4	-0.8	-0.1
300	-0.2	-0.1	-0.4	0.7	1.2	3.7	3.1	-0.5	-1.0	-0.2
400	-0.1	-0.0	-0.2	0.8	0.4	2.6	3.0	0.5	-0.7	-0.4
500	0.0	0.0	-0.1	0.6	0.2	2.8	3.5	1.0	-0.4	-0.2
700	-0.2	-0.1	0.2	0.1	0.2	3.5	4.4	0.6	-0.3	0.2
850	-0.2	-0.1	0.3	-0.0	1.0	4.9	5.8	1.1	-0.2	0.1
1000	-0.0	-0.1	0.3	-0.5	0.6	4.7	6.7	1.3	0.4	0.2

TABLE 8d

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF
THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE
APRIL

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.0	0.0	-0.0	0.1	-0.0	0.2	0.2	0.5	-0.3	-0.2
1	0.2	0.1	0.1	0.5	0.4	0.4	-0.1	0.3	-0.9	0.3
2	0.1	0.1	0.1	0.5	0.4	0.7	0.5	1.2	-0.7	-0.4
5	0.0	0.0	0.1	0.2	0.3	1.0	1.9	2.5	0.5	-0.1
10	-0.0	0.0	-0.0	-0.2	-0.2	0.9	2.5	3.1	0.8	0.1
30	-0.0	-0.1	-0.1	-0.1	-0.1	0.7	2.4	2.6	0.6	0.0
50	-0.0	-0.0	0.1	0.1	-0.0	0.6	1.9	1.7	0.4	0.0
70	-0.1	-0.1	0.1	0.3	0.1	0.5	1.6	1.3	0.3	0.0
100	-0.2	-0.1	0.3	0.3	-0.1	0.3	0.8	0.6	0.0	0.1
150	-0.2	-0.0	0.2	0.2	0.1	0.4	0.3	0.3	0.4	0.0
200	-0.1	-0.0	-0.0	-0.1	0.5	0.8	0.2	-0.0	0.4	0.1
250	-0.1	-0.0	-0.1	-0.2	0.3	1.0	0.5	-0.1	0.1	-0.0
300	0.0	0.0	-0.1	-0.3	-0.1	1.0	0.7	0.3	-0.5	0.2
400	0.0	0.0	-0.0	-0.3	-0.3	0.8	0.6	0.3	-0.4	-0.1
500	-0.0	0.0	-0.0	-0.3	-0.1	0.8	0.8	0.3	-0.5	-0.2
700	-0.2	-0.1	0.1	-0.6	-0.5	0.7	1.0	0.1	-0.5	-0.1
850	-0.1	-0.1	0.1	-0.7	-0.4	0.9	1.1	-0.1	-0.6	-0.0
1000	0.1	-0.1	0.0	-0.9	-0.8	0.7	1.3	0.0	0.2	0.0

TABLE 8e

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF
THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE
MAY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.0	0.0	-0.0	0.0	-0.0	-0.0	-0.1	-0.1	0.0	0.0
1	0.0	0.0	0.1	0.0	0.1	-0.0	-0.0	0.0	0.0	-0.0
2	0.0	0.0	0.1	0.2	0.1	0.1	-0.1	-0.1	-0.1	-0.0
5	0.0	0.1	0.1	0.2	0.1	0.1	0.1	0.0	-0.0	-0.0
10	0.0	0.1	0.2	-0.2	-0.1	-0.0	0.0	-0.2	-0.2	-0.0
30	-0.0	-0.0	0.0	-0.1	-0.5	-0.5	0.3	0.4	0.1	0.0
50	0.0	0.0	0.0	-0.0	-0.3	-0.3	0.3	0.4	0.1	0.0
70	0.0	0.1	0.3	0.1	0.2	0.2	0.5	0.5	0.1	0.0
100	-0.2	-0.0	0.3	0.5	0.5	0.3	0.2	-0.0	0.0	0.0
150	-0.2	-0.0	0.2	0.8	0.5	0.2	0.1	-0.4	-0.2	-0.0
200	-0.1	0.0	0.2	0.5	-0.3	-0.1	0.2	-0.9	-0.4	-0.0
250	0.0	0.1	0.1	0.2	-0.8	-0.2	0.0	-1.0	-0.8	-0.1
300	0.1	0.1	0.0	0.1	-0.9	-0.3	-0.4	-0.3	-1.3	-0.2
400	0.1	0.1	-0.0	0.1	-0.8	-0.7	-0.4	-0.0	-0.5	-0.1
500	0.0	0.0	-0.0	0.0	-0.6	-0.7	-0.2	-0.1	-0.1	0.0
700	-0.3	-0.2	-0.3	0.6	-1.0	-1.3	0.2	0.0	0.2	0.1
850	-0.0	-0.2	-0.5	-1.1	-1.1	-1.4	0.6	0.7	0.1	-0.0
1000	0.3	0.1	-0.7	-1.2	-1.2	-1.1	1.1	1.3	0.5	-0.1

TABLE 8f

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF
THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE
JUNE

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.1	0.0	0.0	0.1	-0.0	-0.1	0.1	0.1	0.1	0.0
1	0.1	0.0	0.1	0.1	0.0	-0.0	0.0	0.1	0.0	-0.0
2	0.1	0.0	0.1	0.1	0.0	-0.0	0.0	0.1	0.1	-0.0
5	0.1	0.0	0.1	0.2	0.0	-0.0	0.1	0.1	0.1	0.0
10	-0.0	0.0	-0.0	-0.1	-0.3	-0.0	-0.2	-0.2	-0.4	-0.2
30	-0.0	-0.1	-0.0	0.1	-0.4	-0.3	-0.0	0.0	-0.1	0.0
50	-0.0	0.0	0.1	0.1	-0.4	-0.5	-0.0	0.1	-0.0	-0.0
70	0.0	0.1	0.1	0.1	-0.3	-0.4	0.0	0.1	-0.0	-0.0
100	-0.1	0.0	0.1	0.4	0.5	0.0	0.2	0.2	-0.1	-0.1
150	-0.4	-0.1	0.2	1.1	0.9	0.1	0.3	0.3	-0.2	-0.1
200	-0.2	-0.1	0.1	0.6	0.3	0.2	0.4	0.2	-0.5	-0.2
250	-0.1	0.0	0.0	-0.1	-0.6	-0.0	0.4	0.1	0.7	-0.2
300	0.1	0.1	-0.1	-0.6	-0.9	-0.3	0.3	0.3	-0.7	-0.2
400	0.1	0.1	-0.1	-0.5	-0.8	-0.4	0.0	0.4	0.2	0.0
500	0.0	0.1	-0.1	-0.4	-0.6	-0.4	-0.0	0.5	0.3	0.1
700	-0.2	-0.2	-0.6	-0.7	-1.0	-0.9	-0.2	0.5	0.2	0.2
850	0.0	-0.2	-1.2	-1.4	-1.5	-1.5	-0.5	0.5	0.3	0.2
1000	0.2	0.0	-1.1	-1.5	-2.6	-2.7	-1.1	0.3	0.3	0.1

TABLE 8g

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF
THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE
JULY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.0	0.0	0.0	0.1	-0.0	-0.1	0.0	-0.0	0.0	-0.0
1	0.0	-0.0	0.0	0.2	-0.0	-0.1	0.0	0.1	0.1	0.0
2	0.1	0.0	0.1	0.2	0.0	-0.0	0.0	0.1	0.1	0.0
5	0.0	0.0	0.2	0.2	0.0	-0.0	0.0	0.1	0.1	0.0
10	-0.0	0.0	-0.1	0.0	-0.3	-0.3	-0.1	-0.1	-0.2	-0.1
30	-0.0	0.0	0.0	0.0	-0.4	-0.4	-0.1	-0.0	0.1	0.1
50	-0.0	0.0	-0.0	-0.0	-0.7	-0.5	-0.1	-0.1	0.1	0.0
70	0.0	0.0	-0.1	-0.2	-0.8	-0.4	-0.0	-0.1	0.1	0.0
100	0.0	0.0	0.0	0.4	0.2	0.0	-0.1	-0.1	0.2	0.1
150	-0.1	-0.1	-0.1	0.9	1.3	0.4	0.1	-0.0	0.0	0.0
200	-0.0	-0.1	-0.1	0.5	1.1	0.5	0.2	0.0	0.2	0.1
250	-0.0	-0.0	-0.2	0.1	0.3	-0.0	-0.0	-0.3	0.2	0.1
300	0.0	-0.0	-0.2	-0.0	-0.4	-0.3	-0.3	-0.3	0.1	0.0
400	-0.0	-0.0	-0.2	-0.1	-0.9	-0.4	-0.4	-0.2	0.1	0.0
500	-0.1	-0.0	-0.1	-0.1	-0.7	-0.4	-0.4	-0.2	0.1	-0.0
700	-0.2	-0.2	-0.3	-0.2	-0.8	-0.6	-0.5	-0.1	-0.0	-0.1
850	0.2	-0.0	-0.7	-0.7	-1.5	-1.6	-1.4	-0.3	0.3	-0.1
1000	0.5	0.2	-0.7	-0.7	-2.4	-3.7	-2.8	-0.5	0.2	-0.1

TABLE 8h

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF
THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE
AUGUST

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.0	0.0	0.1	0.1	0.1	0.0	-0.0	0.0	0.1	0.0
1	0.0	0.0	0.0	0.3	0.0	-0.0	0.1	-0.0	0.1	0.0
2	0.0	0.1	0.1	0.3	0.1	-0.0	0.0	0.0	0.2	0.1
5	0.0	0.1	0.2	0.2	0.1	-0.0	0.1	0.1	0.2	0.1
10	-0.0	-0.0	0.1	0.2	-0.2	-0.1	0.1	0.0	-0.2	-0.1
30	-0.0	0.0	0.0	0.1	-0.2	-0.1	0.1	-0.1	-0.1	-0.0
50	-0.0	0.0	0.1	0.0	-0.3	-0.1	0.3	-0.0	-0.0	-0.0
70	0.0	0.0	-0.0	-0.1	-0.3	-0.1	0.3	0.0	-0.0	-0.0
100	-0.0	0.0	0.2	0.1	0.1	-0.0	0.3	0.0	0.0	0.0
150	-0.1	-0.1	-0.1	0.5	0.7	-0.0	0.6	0.2	-0.1	-0.0
200	-0.1	-0.1	-0.2	0.5	0.7	0.2	1.1	0.4	-0.2	-0.1
250	0.0	-0.0	-0.2	0.2	0.2	0.6	1.2	0.2	-0.2	-0.0
300	0.0	0.0	-0.2	0.1	-0.2	0.7	1.0	-0.1	-0.0	0.1
400	-0.1	-0.0	-0.2	-0.1	-0.4	0.5	0.6	0.0	0.2	0.1
500	-0.1	-0.0	-0.1	-0.1	-0.3	0.4	0.6	0.2	0.1	0.0
700	-0.2	-0.2	-0.3	-0.1	-0.4	-0.2	0.2	0.2	0.0	0.0
850	0.2	-0.0	-0.8	-0.6	-1.0	-1.3	0.0	0.2	0.1	0.0
1000	0.7	0.3	-0.8	-0.8	-1.8	-2.6	-0.2	0.1	-0.2	-0.1

TABLE 8i

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF
THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE
SEPTEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.0	-0.0	0.0	0.1	0.1	0.3	0.6	0.8	0.3	0.1
1	0.1	0.0	0.0	0.2	-0.0	0.4	0.9	1.3	0.8	0.2
2	0.1	0.0	0.1	0.3	0.0	0.6	1.2	1.5	0.8	0.2
5	0.1	0.0	0.2	0.2	0.1	0.6	1.4	1.4	0.8	0.2
10	-0.0	-0.0	0.2	-0.0	-0.2	0.8	2.0	1.6	0.2	-0.0
30	-0.0	-0.0	0.1	-0.0	-0.0	0.5	1.7	1.4	0.6	0.1
50	0.0	0.1	0.2	-0.0	-0.1	0.5	1.7	1.2	0.5	0.1
70	0.0	0.0	0.2	-0.0	-0.0	0.5	1.5	1.0	0.4	0.1
100	-0.4	-0.0	0.4	0.2	0.2	0.0	1.2	0.5	0.3	0.1
150	-0.3	-0.1	0.2	0.5	0.2	0.1	1.3	0.1	0.0	-0.0
200	-0.2	-0.1	-0.0	0.5	0.1	1.3	1.8	-0.2	0.1	0.0
250	0.0	-0.0	-0.2	0.3	-0.0	2.0	1.8	0.2	0.4	0.1
300	0.1	-0.0	-0.3	0.0	-0.1	1.6	1.2	0.2	0.4	0.1
400	0.0	-0.0	-0.3	-0.1	-0.1	0.9	0.8	0.2	0.2	0.1
500	-0.1	-0.1	-0.2	-0.0	0.0	0.7	1.0	0.3	0.3	0.1
700	-0.2	-0.2	-0.3	-0.3	-0.1	0.4	1.3	0.5	0.3	0.1
850	-0.1	-0.1	-0.6	-0.8	-0.2	-0.0	1.4	0.6	0.4	0.1
1000	0.0	-0.1	-0.7	-1.1	-0.2	-0.1	1.8	0.7	0.4	0.0

TABLE 8j

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF
THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE
OCTOBER

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.0	-0.0	0.0	0.1	0.1	1.0	2.2	2.7	1.2	0.3
1	-0.1	-0.1	-0.0	0.2	0.5	1.7	3.7	3.9	2.0	0.5
2	-0.0	-0.0	0.0	0.4	0.5	1.8	4.1	4.9	2.4	0.5
5	-0.1	-0.1	-0.0	0.4	0.7	1.6	4.1	5.0	1.9	0.4
10	-0.0	-0.1	-0.1	-0.4	0.1	2.2	6.1	7.2	2.1	0.4
30	-0.0	-0.0	-0.1	-0.1	0.6	2.1	4.9	4.5	1.0	0.1
50	-0.0	-0.0	-0.1	-0.3	0.4	2.0	4.2	3.1	0.7	0.1
70	-0.0	0.0	-0.1	-0.7	0.1	1.7	3.8	2.3	0.4	0.1
100	-0.2	-0.0	-0.2	-0.8	-0.0	1.3	3.1	1.2	0.0	-0.0
150	-0.2	-0.0	-0.2	-0.2	0.2	1.6	2.9	0.4	-0.4	-0.1
200	-0.0	0.0	-0.0	0.4	0.7	2.9	2.9	-0.2	-0.8	-0.2
250	0.1	0.0	0.1	0.6	0.6	3.3	2.7	-0.4	-1.0	-0.2
300	0.1	0.1	0.1	0.5	0.7	2.7	1.8	-0.3	-0.6	-0.2
400	0.0	0.0	0.1	0.4	0.5	1.8	1.1	0.3	-0.0	-0.1
500	-0.0	-0.0	0.0	0.3	0.4	1.5	1.6	0.7	0.3	0.1
700	-0.1	-0.1	-0.0	-0.1	0.2	1.8	2.6	0.7	0.1	0.1
850	-0.0	-0.0	-0.1	-0.4	0.2	2.0	3.6	0.9	-0.3	-0.1
1000	0.0	0.0	-0.2	-0.6	0.2	2.4	3.8	0.6	-0.7	-0.2

TABLE 8k

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF
THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE
NOVEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.2	-0.2	-0.0	0.3	0.4	0.8	1.6	1.7	0.3	-0.0
1	0.0	0.0	-0.0	0.5	1.7	2.1	2.3	2.4	0.0	-0.2
2	-0.0	-0.0	0.0	0.7	1.5	2.2	3.7	3.9	0.9	0.0
5	-0.1	-0.1	-0.0	0.5	1.0	1.8	4.8	5.2	1.8	0.3
10	-0.0	-0.1	-0.1	-0.4	0.1	2.0	5.2	6.7	2.5	0.3
30	-0.0	-0.0	-0.1	-0.1	0.4	2.0	5.5	5.6	1.7	0.2
50	-0.0	-0.0	-0.1	-0.3	0.3	1.8	4.6	4.0	1.2	0.1
70	-0.1	0.0	-0.3	-0.8	0.0	1.6	4.0	2.8	0.6	0.0
100	-0.1	-0.0	-0.2	-0.3	0.3	0.9	3.4	1.3	0.0	0.0
150	-0.1	0.0	-0.1	-0.3	-0.2	1.5	3.5	0.7	-0.5	-0.0
200	-0.1	-0.0	0.1	0.5	0.5	3.0	4.2	0.0	-0.8	-0.0
250	-0.0	-0.0	0.2	0.7	0.9	3.3	4.3	-0.3	-1.0	-0.1
300	0.0	0.0	0.2	0.7	0.8	2.7	3.2	-0.4	-0.8	-0.1
400	-0.0	0.0	0.1	0.5	0.6	1.8	2.4	0.3	-0.2	-0.1
500	-0.0	0.0	0.1	0.4	0.5	1.8	2.9	0.7	-0.2	-0.1
700	0.2	-0.1	-0.0	0.1	0.2	2.5	4.7	1.0	-0.2	-0.0
850	0.0	0.0	0.1	-0.1	0.3	3.8	6.6	1.2	-0.3	-0.0
1000	0.0	0.0	0.2	-0.1	0.2	4.5	7.8	1.1	-0.8	-0.1

TABLE 8l

NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE STANDING EDDIES OF
THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE
DECEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.0	0.0	-0.5	-0.9	1.7	6.2	7.2	4.6	1.5	0.3
1	-0.0	0.0	0.4	3.4	13.6	18.8	13.2	7.8	2.3	0.4
2	-0.1	-0.0	0.1	2.5	13.0	20.6	16.8	9.4	2.6	0.4
5	-0.1	-0.1	-0.2	1.3	8.2	15.9	16.8	8.2	1.5	0.2
10	-0.0	-0.1	-0.1	0.6	5.1	15.0	17.2	7.7	0.9	-0.0
30	-0.0	-0.0	-0.1	0.4	3.0	9.8	12.0	4.7	-0.1	-0.2
50	-0.0	0.0	-0.1	-0.0	2.3	7.5	8.6	2.4	-0.4	-0.2
70	-0.0	-0.0	-0.4	-0.5	1.7	6.1	6.3	0.9	-0.8	-0.3
100	-0.1	0.0	-0.2	-0.6	1.2	4.5	3.9	-0.5	-1.5	-0.5
150	-0.2	-0.0	-0.2	-0.3	1.3	3.8	2.4	-1.8	-1.7	-0.5
200	-0.1	-0.0	-0.1	-0.1	2.1	4.2	1.8	-3.0	-2.0	-0.6
250	-0.1	0.0	0.0	-0.1	2.5	4.1	1.1	-2.9	-2.1	-0.6
300	-0.1	0.0	0.1	-0.0	1.9	3.2	0.5	-1.9	-1.4	-0.4
400	-0.1	0.0	0.0	0.1	1.3	2.5	0.5	-0.7	-0.5	-0.1
500	-0.0	0.0	-0.0	0.1	1.4	2.9	1.0	-0.2	-0.0	-0.0
700	-0.1	-0.1	-0.0	0.2	1.8	4.0	2.0	-0.3	0.2	0.2
850	-0.2	-0.1	0.1	0.2	2.4	6.8	3.3	-0.7	0.2	0.1
1000	-0.4	-0.1	0.2	-0.2	2.2	7.9	3.8	-1.1	0.6	0.1

TABLE 7a NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JANUARY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.2	-0.4	-0.1	0.0	3.7	14.3	19.4	12.5	4.0	1.6
1	-0.1	0.8	1.7	8.4	24.8	42.4	45.1	31.0	7.9	-0.5
2	-0.4	0.4	1.6	7.4	23.6	45.6	51.3	35.4	12.4	4.4
5	-0.5	-0.0	0.8	3.5	13.1	33.5	47.9	39.3	19.2	10.5
10	0.1	0.2	0.1	0.2	6.3	22.1	35.1	29.9	11.3	4.9
30	0.0	0.2	-0.1	0.5	3.0	13.7	24.1	19.8	10.4	5.3
50	0.0	0.3	0.3	0.5	1.8	8.5	15.9	15.0	7.3	3.6
70	-0.1	0.1	0.2	0.1	1.2	6.0	11.0	11.3	5.7	2.8
100	-0.1	0.2	0.3	1.0	2.6	6.0	8.9	9.4	5.5	3.1
150	-0.1	0.2	-0.1	0.9	4.5	6.6	7.1	7.1	4.9	2.9
200	-0.2	-0.2	-0.7	1.8	6.0	6.4	6.0	5.6	3.8	2.4
250	-0.4	-0.3	-0.6	3.1	5.8	4.6	4.5	3.9	2.8	2.2
300	-0.4	-0.4	-0.4	3.1	5.3	4.4	3.5	3.2	2.7	1.8
400	-0.1	-0.2	-0.2	3.1	6.0	5.5	4.5	4.5	3.7	2.1
500	0.0	-0.1	-0.2	3.5	8.7	8.1	6.5	5.9	4.4	2.7
700	0.2	0.1	0.6	5.0	11.6	11.4	8.2	7.7	5.0	3.5
850	0.3	0.2	1.2	6.3	12.1	11.0	9.2	8.4	6.3	4.2
1000	0.6	0.3	1.2	5.2	9.0	7.4	8.3	7.8	6.6	4.5

TABLE 7b NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE FEBRUARY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.1	-0.3	-0.0	1.3	6.4	22.7	35.8	36.4	22.0	10.2
1	-0.1	-0.2	0.5	3.9	15.5	44.5	69.0	65.9	40.9	20.4
2	0.1	-0.1	0.6	4.4	18.1	51.2	80.3	78.6	45.2	21.5
5	0.3	0.0	0.4	2.7	12.0	37.1	64.4	68.6	37.6	16.4
10	-0.1	-0.1	-0.0	0.5	5.9	23.1	43.8	52.2	34.3	16.6
30	-0.1	-0.3	-0.1	0.1	1.9	7.4	22.5	32.7	18.4	6.0
50	-0.1	0.2	0.6	0.2	0.4	3.8	15.8	22.1	9.3	1.9
70	-0.0	0.1	0.5	-0.1	0.1	2.7	11.9	16.8	7.1	1.7
100	0.3	0.3	0.1	1.1	1.5	2.9	9.4	13.0	6.0	1.6
150	-0.4	-0.7	-0.4	1.8	3.8	3.7	7.8	9.8	5.4	2.0
200	-0.3	-0.6	-0.4	3.5	5.3	4.0	6.3	7.7	4.7	1.9
250	-0.1	-0.5	-0.1	4.6	5.7	3.5	3.8	5.3	3.4	1.3
300	0.1	-0.3	0.1	4.3	5.7	3.3	2.0	3.7	3.1	1.5
400	-0.0	-0.2	0.0	3.4	6.3	4.6	2.7	3.8	3.3	1.5
500	0.0	-0.1	-0.1	3.5	8.5	7.4	5.1	5.7	4.4	2.7
700	0.4	0.1	0.5	5.0	11.0	10.7	7.6	7.8	5.3	3.2
850	0.3	0.2	1.2	6.1	11.4	11.3	9.3	9.4	6.9	4.3
1000	0.2	0.2	1.0	4.7	8.8	8.8	8.7	8.4	7.7	4.7

TABLE 7c NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MARCH

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.0	-0.1	-0.5	-0.1	1.6	5.7	9.3	10.2	8.3	5.2
1	0.5	0.3	0.5	1.4	4.3	10.4	18.7	20.7	16.3	9.9
2	0.8	0.4	0.4	1.1	4.9	12.3	22.5	24.4	16.6	9.3
5	0.8	0.9	0.6	0.6	3.5	9.7	19.2	19.8	10.9	5.9
10	-0.1	0.1	0.5	0.7	3.4	10.4	17.8	14.6	5.3	2.2
30	-0.1	0.1	0.3	0.6	2.0	6.6	14.5	9.9	1.3	-0.1
50	-0.0	0.1	-0.0	0.8	1.5	4.9	9.1	5.9	1.3	0.8
70	0.0	0.3	0.2	0.5	1.3	4.3	6.8	3.5	1.5	1.1
100	-1.4	-0.1	-0.3	1.1	3.4	5.0	6.6	2.9	1.0	-0.3
150	-0.4	-0.5	-0.8	1.7	5.6	6.4	8.4	2.7	0.7	0.3
200	-0.4	-0.3	-0.8	3.6	6.8	6.7	5.6	2.0	0.3	0.8
250	0.0	-0.3	-0.4	4.6	6.3	4.6	3.7	1.2	-0.4	1.3
300	0.1	-0.3	-0.2	4.3	6.2	3.6	2.6	1.5	-0.4	0.6
400	0.3	-0.1	-0.1	3.5	7.5	5.1	3.9	3.3	1.6	-0.0
500	0.3	0.0	-0.1	3.5	9.6	7.7	6.6	5.2	2.4	0.4
700	0.4	0.2	0.5	4.9	11.5	10.7	8.9	7.7	3.5	1.6
850	0.3	0.1	1.3	6.5	12.0	11.1	10.4	9.4	4.8	2.3
1000	0.1	-0.0	1.2	5.2	9.0	8.5	10.2	9.8	5.6	2.6

TABLE 7d NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE APRIL

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.2	-0.0	-0.3	0.2	0.6	1.9	3.1	3.1	1.8	0.0
1	-0.2	0.1	0.4	0.6	2.4	4.5	5.6	4.2	0.0	-2.0
2	-0.4	0.1	0.2	0.8	2.6	5.3	7.1	6.3	2.4	-0.3
5	-0.3	0.1	0.1	0.6	1.9	4.5	6.6	6.9	4.7	2.0
10	0.0	0.3	0.2	0.5	1.6	4.4	6.9	6.9	4.7	2.2
30	-0.2	0.0	-0.1	0.4	1.6	4.0	5.6	5.6	1.4	0.1
50	-0.1	0.0	-0.2	0.6	1.7	3.9	4.8	4.3	0.2	-0.4
70	0.0	0.0	-0.2	0.3	1.8	4.1	4.3	3.5	-0.5	-0.9
100	-0.4	-0.9	-1.0	1.2	3.5	5.4	4.5	3.6	0.2	-0.6
150	-0.1	-0.5	-0.5	2.8	6.2	7.7	5.0	3.8	0.8	-0.2
200	0.1	-0.2	-0.1	3.2	6.8	8.3	5.3	3.4	1.1	0.5
250	0.2	-0.1	0.3	3.3	6.3	6.9	4.6	2.3	1.0	0.7
300	0.3	0.0	0.3	2.9	6.3	6.3	4.1	1.8	1.1	0.6
400	0.3	-0.0	0.1	2.1	6.8	7.8	5.4	4.4	1.8	0.6
500	0.3	-0.1	-0.1	2.1	8.1	9.9	7.3	6.4	2.5	0.8
700	0.4	-0.0	0.1	3.1	10.4	12.2	8.9	8.0	3.9	1.8
850	0.2	-0.1	0.6	4.2	11.1	12.6	9.7	9.5	4.5	2.2
1000	0.2	0.0	0.7	3.7	8.0	9.5	9.0	10.2	5.7	2.7

TABLE 7e NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MAY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.6	0.1	0.0	0.2	0.3	0.3	0.2	0.3	0.3	0.2
1	0.4	0.4	0.3	0.2	0.7	0.9	0.9	0.6	0.3	0.2
2	0.3	0.3	0.3	0.4	0.8	1.2	1.1	0.8	0.4	0.3
5	0.1	0.2	0.1	0.3	0.5	1.1	1.0	0.8	0.3	0.2
10	0.0	0.0	0.3	0.0	0.4	1.1	0.7	0.7	0.1	-0.0
30	-0.0	-0.1	-0.2	0.2	0.4	0.9	0.8	0.4	-0.0	-0.1
50	0.1	0.1	-0.1	0.1	0.3	1.2	1.1	0.4	0.1	0.1
70	0.0	-0.0	0.2	0.1	0.5	1.6	1.6	0.6	0.3	0.3
100	-0.2	-0.0	0.1	1.0	3.0	3.3	2.4	1.2	0.8	0.5
150	0.4	0.4	-0.1	1.6	5.1	5.6	3.3	1.6	1.6	1.2
200	0.4	0.2	-0.1	1.9	5.1	6.7	3.7	1.6	2.5	1.7
250	0.5	0.1	0.1	2.2	5.3	7.0	3.5	0.9	2.6	1.7
300	0.4	0.1	0.0	1.7	5.4	7.1	4.0	1.1	3.1	1.6
400	0.2	0.1	-0.1	0.9	4.7	7.4	5.0	3.0	2.7	0.5
500	0.1	0.0	-0.0	0.8	4.9	8.2	6.0	4.0	2.6	0.7
700	0.1	-0.1	0.1	1.4	6.1	9.8	6.8	5.2	3.7	1.6
850	0.1	0.3	0.2	2.3	6.7	10.9	7.0	6.6	3.9	2.1
1000	0.3	-0.5	0.2	2.3	5.1	8.1	6.2	7.4	3.8	2.3

TABLE 7f NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JUNE

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.2	-0.1	0.0	0.2	0.1	0.0	0.0	-0.1	-0.0	-0.0
1	-0.1	0.1	0.0	-0.0	0.0	0.3	0.4	0.2	0.1	0.1
2	-0.2	0.0	0.1	0.1	0.2	0.4	0.3	0.1	0.2	0.2
5	-0.3	-0.1	0.4	0.1	0.1	0.3	0.2	0.1	0.1	0.1
10	0.0	0.2	-0.0	0.1	-0.0	0.0	0.2	0.4	0.1	-0.0
30	-0.0	0.1	0.0	0.3	0.1	0.2	0.2	0.1	0.1	-0.0
50	-0.1	0.1	-0.2	0.1	0.2	0.4	0.3	0.1	0.0	-0.1
70	0.0	0.1	-0.0	0.1	0.3	0.7	0.6	0.2	-0.0	-0.2
100	-0.7	0.1	0.2	0.5	1.6	2.3	1.5	0.6	0.3	0.1
150	-0.2	0.0	0.5	0.8	3.0	4.6	2.9	1.3	0.5	0.1
200	0.1	-0.1	0.1	0.9	4.0	6.3	3.9	1.7	0.9	0.4
250	0.1	-0.1	0.0	1.0	4.3	5.8	3.7	1.5	0.9	0.7
300	0.2	0.0	-0.1	0.8	3.6	5.5	3.9	1.5	1.0	0.2
400	0.1	0.1	-0.1	0.4	2.4	5.4	4.5	2.4	1.1	-0.0
500	0.1	0.1	-0.1	0.1	2.1	5.3	4.6	3.3	1.5	0.3
700	0.3	0.0	-0.1	0.4	2.8	5.8	5.0	4.6	1.9	0.5
850	0.3	-0.1	-0.0	0.9	3.6	6.7	5.5	6.7	2.2	1.1
1000	0.2	0.0	0.2	1.2	3.0	5.5	4.7	7.8	2.0	0.7

TABLE 9g NORTHWARD FLUX OF HEAT (°K M/S) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 9-YEAR (1979-1982) AVERAGE JULY

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.0	0.0	0.1	0.0	0.1	0.1	0.1	-0.0	0.0	0.1
1	0.2	-0.1	-0.1	-0.1	0.1	0.2	0.3	0.2	0.1	0.2
2	0.0	-0.1	-0.0	-0.1	0.1	0.3	0.3	0.1	0.1	0.1
5	-0.1	-0.0	-0.0	-0.0	0.2	0.3	0.2	0.2	0.1	0.1
10	0.1	-0.1	0.2	0.2	0.4	0.0	0.2	0.4	0.2	0.1
30	0.0	-0.1	-0.0	0.2	0.7	0.3	0.2	0.2	0.2	0.1
50	0.0	0.1	0.1	0.1	0.3	0.5	0.4	0.3	-0.0	-0.1
70	0.0	0.0	0.1	0.3	0.6	0.7	0.6	0.4	0.1	-0.0
100	-0.4	0.2	0.3	0.2	0.7	1.4	1.0	0.8	0.4	0.2
150	0.2	0.1	0.4	0.8	2.0	3.6	2.1	1.5	0.8	0.4
200	0.4	0.1	0.1	0.5	2.7	5.7	3.4	2.1	1.3	0.5
250	0.3	0.0	-0.1	0.4	3.0	5.2	4.3	2.8	1.6	0.8
300	0.2	0.1	-0.1	0.2	2.3	4.2	4.7	3.2	1.9	1.7
400	0.1	0.0	-0.0	0.1	1.5	3.4	4.6	3.4	2.3	2.3
500	0.2	-0.0	0.1	0.1	1.1	3.2	4.4	3.3	2.7	2.5
700	0.1	0.0	-0.0	0.1	1.5	4.1	4.3	3.8	3.2	2.6
850	-0.1	-0.2	-0.2	0.4	2.3	5.3	4.4	5.6	3.9	2.9
1000	-0.2	-0.2	-0.1	0.6	2.3	4.5	3.9	7.5	3.0	1.9

TABLE 7i NORTHWARD FLUX OF HEAT (°K M/S) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 9-YEAR (1979-1982) AVERAGE SEPTEMBER

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.3	0.1	0.0	-0.2	0.1	0.5	0.9	1.5	1.4	0.8
1	-0.3	-0.1	0.1	0.1	0.3	1.4	3.0	3.8	2.8	1.6
2	0.0	0.0	0.1	0.1	0.4	1.6	3.2	4.3	3.3	1.8
5	0.0	0.1	0.1	0.1	0.3	1.0	2.1	3.2	2.1	1.1
10	-0.0	-0.1	-0.0	0.1	0.3	1.1	2.7	2.8	1.1	0.4
30	-0.1	-0.2	-0.2	0.0	0.4	1.4	2.3	1.7	0.5	0.2
50	-0.1	0.1	0.1	0.2	0.8	1.9	2.1	1.4	0.3	0.2
70	-0.0	-0.0	0.1	0.4	1.0	2.3	2.3	1.4	0.4	0.2
100	-0.5	0.2	0.3	0.4	1.2	3.8	3.0	1.6	0.4	0.2
150	-0.2	0.1	0.3	0.4	1.9	5.6	3.8	2.0	0.5	0.2
200	0.0	0.1	0.1	0.6	2.8	6.2	3.9	2.1	0.4	0.2
250	0.3	0.1	0.2	0.8	3.2	5.4	3.7	1.7	0.4	0.3
300	0.3	0.1	0.3	0.6	3.0	5.6	4.1	2.4	0.9	0.5
400	0.2	0.1	0.2	0.4	2.6	6.2	5.8	4.3	2.7	1.4
500	0.2	0.1	0.1	0.1	2.3	6.6	6.7	5.4	3.6	1.8
700	0.2	0.1	-0.0	0.3	3.2	8.5	7.9	6.8	4.4	2.2
850	0.2	-0.0	-0.1	0.9	5.1	9.9	8.4	7.8	4.5	2.7
1000	0.4	0.1	-0.1	0.7	4.1	7.4	6.6	7.3	4.3	2.7

TABLE 9k NORTHWARD FLUX OF HEAT (°K M/S) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 9-YEAR (1979-1982) AVERAGE NOVEMBER

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.1	0.1	-0.0	0.7	1.2	2.0	5.3	7.9	5.7	3.4
1	0.5	0.5	1.9	4.6	6.6	3.6	5.1	12.1	11.5	5.9
2	0.4	0.3	1.2	3.9	5.8	4.4	8.6	14.7	10.6	5.3
5	0.1	0.2	0.3	1.9	2.9	4.0	8.7	10.2	3.4	1.0
10	-0.0	0.2	0.1	0.5	1.1	3.3	8.0	6.7	4.5	3.5
30	0.0	0.1	-0.0	0.6	1.1	3.3	4.4	2.6	1.7	1.0
50	0.0	0.1	0.1	1.0	1.8	3.5	3.7	1.5	0.8	0.3
70	0.1	0.1	0.4	1.1	2.0	3.4	3.5	1.2	0.6	0.2
100	-0.6	-0.1	0.4	0.9	2.6	4.4	3.9	0.9	0.1	0.2
150	-0.2	-0.1	-0.1	1.4	4.6	6.5	4.7	0.8	0.0	0.0
200	-0.0	-0.1	0.0	2.1	5.8	7.5	5.2	0.5	0.7	0.9
250	-0.0	-0.0	0.4	2.7	5.8	6.6	4.5	0.6	1.7	1.7
300	0.0	0.0	0.4	2.8	6.1	6.3	3.8	1.6	2.4	1.9
400	-0.0	0.0	0.1	2.3	7.1	8.2	5.9	4.0	2.9	1.2
500	0.0	-0.0	-0.0	2.1	8.2	10.8	8.5	6.0	3.5	1.5
700	0.4	0.1	0.1	2.4	10.3	13.6	10.1	7.8	4.0	2.0
850	0.0	-0.0	0.7	4.4	11.8	13.6	10.7	8.3	5.0	2.8
1000	0.4	-0.0	0.6	3.1	8.1	7.5	7.2	5.4	4.9	3.3

TABLE 7k NORTHWARD FLUX OF HEAT (°K M/S) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 9-YEAR (1979-1982) AVERAGE AUGUST

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.4	0.2	-0.0	0.1	0.1	0.0	-0.1	0.1	0.0	0.0
1	-0.2	-0.0	-0.0	0.0	0.2	0.5	0.6	0.6	0.1	0.1
2	0.0	-0.0	0.0	0.2	0.4	0.5	0.6	0.6	0.2	0.2
5	0.1	-0.1	0.1	0.1	0.2	0.3	0.4	0.5	0.3	0.2
10	0.1	0.2	-0.1	0.1	0.2	0.5	0.9	1.1	0.7	0.5
30	0.0	0.0	-0.0	0.1	0.3	0.7	1.0	0.9	0.3	0.2
50	-0.0	0.1	-0.1	0.1	0.4	1.2	1.0	0.8	0.2	0.3
70	-0.1	-0.0	0.1	0.0	0.5	1.6	1.3	0.8	0.3	0.3
100	-0.5	0.2	0.5	0.5	0.8	2.6	2.0	1.1	0.4	0.4
150	-0.4	0.0	0.4	0.7	1.8	4.9	3.1	1.6	0.8	0.9
200	-0.1	0.1	0.1	0.4	2.2	6.6	4.0	1.9	1.5	1.5
250	-0.1	0.1	0.0	0.6	2.2	5.8	4.0	1.7	1.7	2.1
300	-0.1	-0.0	0.0	0.5	1.9	4.8	4.5	2.3	2.0	2.5
400	0.2	0.1	0.0	0.2	1.2	4.2	5.3	3.3	3.1	2.7
500	0.3	0.1	0.0	0.2	0.9	4.2	5.2	3.4	3.8	3.1
700	0.1	0.1	-0.0	0.2	1.4	5.4	5.3	4.5	4.8	3.6
850	0.3	-0.1	-0.1	0.5	2.2	6.7	5.5	6.2	4.7	3.2
1000	0.4	-0.1	-0.2	0.5	2.0	6.1	4.9	7.7	4.0	2.4

TABLE 9j NORTHWARD FLUX OF HEAT (°K M/S) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 9-YEAR (1979-1982) AVERAGE OCTOBER

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.3	-0.0	0.0	-0.7	-0.5	1.8	5.9	10.6	8.3	4.8
1	-0.3	-0.0	-0.1	0.3	2.2	9.5	18.2	20.6	13.8	7.3
2	-0.1	-0.0	-0.0	-0.0	1.6	9.1	18.8	23.4	15.9	8.3
5	-0.0	0.0	-0.0	-0.3	0.7	5.3	12.6	15.3	10.9	7.7
10	0.0	-0.0	-0.3	0.0	0.5	2.5	3.0	9.5	5.8	3.2
30	0.0	0.2	0.1	0.5	1.0	2.6	4.9	5.5	3.3	1.9
50	0.0	0.1	0.3	0.5	1.6	2.9	4.0	4.2	2.5	1.4
70	-0.0	0.0	0.1	0.9	1.8	3.5	3.9	3.7	2.0	1.0
100	-0.0	0.7	0.5	0.9	2.2	4.9	4.3	3.6	1.8	1.1
150	-0.5	0.1	0.1	1.2	3.3	6.4	4.7	3.0	1.5	1.0
200	-0.7	-0.2	-0.1	1.2	4.5	6.7	4.4	2.7	1.2	0.8
250	-0.2	-0.2	0.1	1.1	5.4	5.8	3.5	2.4	0.8	0.1
300	0.0	-0.1	0.1	0.9	5.6	5.6	3.4	2.5	0.8	-1.0
400	0.1	0.1	0.1	0.6	5.4	7.2	5.3	4.1	2.2	-0.2
500	0.2	0.1	-0.1	0.6	5.6	8.9	7.2	5.5	3.4	0.9
700	0.1	0.1	-0.0	1.0	7.6	11.3	9.1	7.2	4.2	0.9
850	0.1	-0.1	0.2	2.5	9.6	12.1	10.0	7.8	5.0	2.3
1000	0.0	0.0	-0.1	1.8	6.3	6.6	7.4	6.1	5.6	3.1

TABLE 9l NORTHWARD FLUX OF HEAT (°K M/S) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 9-YEAR (1979-1981) AVERAGE DECEMBER

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.2	-0.4	-0.8	-1.0	2.9	7.4	8.8	9.5	7.8	4.5
1	0.7	0.6	1.5	6.9	16.5	17.3	19.1	27.6	26.5	15.4
2	0.7	0.3	0.8	5.2	15.1	19.2	21.1	26.3	22.8	13.3
5	0.4	0.0	0.2	2.2	8.5	14.2	18.0	20.6	14.5	7.9
10	-0.0	0.1	-0.0	1.2	5.3	8.0	8.4	7.8	4.5	2.7
30	0.0	0.1	-0.1	0.4	2.7	4.5	4.5	2.4	-0.3	0.0
50	-0.1	-0.2	0.3	1.0	2.0	4.1	4.1	0.3	-2.8	-2.0
70	-0.0	0.0	0.5	1.4	1.9	3.7	3.7	0.1	-3.3	-2.2
100	0.2	0.4	0.5	1.8	3.2	4.4	4.3	-0.1	-4.5	-3.0
150	-0.6	-0.4	-0.1	1.8	5.3	5.8	4.9	-0.8	-4.2	-2.2
200	-0.5	-0.6	-0.3	2.6	6.1	6.5	4.7	-0.6	-3.4	-1.4
250	-0.3	-0.5	-0.1	3.6	6.2	5.5	3.9	0.5	-2.0	-0.9
300	-0.3	-0.4	0.0	3.4	5.7	5.2	3.7	2.1	-0.1	0.1
400	-0.1	-0.2	0.1	3.1	5.7	6.3	6.1	5.1	2.7	0.7
500	-0.0	-0.2	-0.0	3.0	7.4	9.0	9.1	7.1	4.0	1.8
700	0.1	0.1	0.5	3.7	9.4	11.9	11.1	9.4	6.1	4.0
850	0.3	0.3	1.1	5.0	9.9	11.0	12.1	10.0	6.9	5.0
1000	0.3	0.4	1.0	3.7	7.1	6.2	10.4	8.4	6.6	4.8

TABLE 10a NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE JANUARY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)										
	5	10	20	30	40	50	60	70	80	85	
0.4	-0.1	-0.2	-0.3	-0.6	0.5	5.0	8.9	7.8	2.6	1.2	
1	0.2	0.3	1.0	3.4	7.4	13.5	22.2	24.2	8.3	0.7	
2	0.1	0.1	0.8	2.8	7.6	16.1	23.1	22.1	9.7	4.0	
5	0.0	-0.0	0.3	1.4	4.9	12.4	20.1	21.3	13.9	9.0	
10	-0.0	-0.0	-0.0	0.3	2.0	5.4	9.2	11.8	8.0	4.8	
30	0.0	0.0	0.0	0.0	0.3	3.4	9.7	12.9	9.9	5.3	
50	-0.0	0.0	-0.0	-0.2	-0.2	1.9	7.8	11.7	7.2	3.6	
70	0.0	0.0	-0.1	-0.3	-0.3	1.1	5.6	9.5	5.5	2.8	
100	-0.0	-0.0	-0.0	-0.1	-0.2	0.7	4.1	7.5	5.1	3.0	
150	-0.1	-0.0	-0.0	0.1	-0.0	0.4	2.8	5.8	4.1	2.7	
200	-0.0	-0.0	-0.0	0.1	0.1	0.2	0.2	2.1	4.8	3.2	2.2
250	-0.0	-0.0	-0.1	0.0	0.3	0.1	1.3	3.5	2.5	1.9	
300	0.0	-0.0	-0.1	0.0	0.2	0.1	0.4	2.0	2.3	1.4	
400	-0.0	-0.0	-0.1	0.0	0.1	0.2	0.1	1.3	2.3	1.6	
500	0.0	-0.0	-0.1	0.0	0.1	0.3	0.0	1.2	2.4	2.1	
700	0.0	0.0	0.0	-0.0	0.0	0.3	-0.2	1.4	2.8	2.7	
850	0.0	0.0	0.0	-0.0	0.0	0.3	-0.2	1.8	3.7	3.6	
1000	0.0	-0.0	0.0	-0.0	0.1	0.2	-0.3	2.0	3.7	3.8	

TABLE 10b NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE FEBRUARY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.0	-0.1	-0.1	0.5	2.1	8.6	20.2	29.3	21.3	10.1
1	-0.0	-0.0	0.3	1.0	4.2	15.2	34.7	48.4	38.3	20.0
2	0.1	0.1	0.3	1.2	5.3	18.6	42.9	60.5	43.1	20.8
5	0.1	0.1	0.2	0.9	4.2	14.9	35.9	52.5	34.7	15.6
10	0.0	-0.0	0.2	0.4	2.3	8.4	26.3	48.4	38.1	17.2
30	-0.0	-0.0	-0.0	0.1	0.5	3.4	14.6	25.2	17.2	6.0
50	0.0	0.0	0.0	-0.0	0.2	2.2	9.3	15.3	7.8	2.0
70	-0.0	-0.1	-0.1	-0.2	-0.1	1.5	6.4	10.7	5.4	1.6
100	-0.1	-0.1	-0.1	-0.1	-0.1	1.0	4.7	7.7	4.1	1.1
150	-0.1	-0.1	-0.0	0.1	0.0	0.6	3.2	5.4	3.1	1.4
200	-0.0	-0.0	-0.0	0.3	0.1	0.3	2.4	4.2	2.5	1.4
250	0.0	-0.0	0.0	0.3	0.2	0.3	1.5	3.0	1.9	0.8
300	0.0	0.0	0.1	0.2	0.2	0.2	0.8	1.7	1.9	1.2
400	0.1	0.0	0.1	0.2	0.3	0.3	0.4	0.9	1.7	1.2
500	0.1	0.0	0.1	0.2	0.3	0.4	0.3	1.1	2.3	2.1
700	0.1	0.1	0.1	0.2	0.3	0.4	0.4	1.6	2.7	2.5
850	0.1	0.1	0.2	0.2	0.2	0.4	0.5	1.9	3.5	3.3
1000	0.1	0.1	0.2	0.1	0.2	0.4	0.3	1.5	4.2	4.1

TABLE 10c NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE MARCH

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.2	0.1	-0.2	-0.1	0.5	1.9	4.4	7.0	7.6	5.2
1	0.0	0.1	0.1	0.3	1.6	5.0	11.4	18.4	15.3	9.8
2	0.1	0.2	0.1	0.4	1.8	5.1	11.8	17.4	15.2	9.2
5	0.1	0.2	0.1	0.4	1.2	2.6	6.5	11.1	9.9	5.8
10	0.0	0.1	0.3	0.5	0.9	1.5	3.7	5.5	3.2	1.8
30	0.0	0.0	0.1	0.2	0.4	1.0	2.3	2.3	0.1	-0.4
50	-0.0	0.0	0.1	0.1	0.3	0.9	1.4	0.8	0.4	0.7
70	-0.0	-0.0	-0.0	0.0	0.2	0.5	0.9	-0.1	0.8	1.0
100	-0.1	-0.0	-0.1	0.0	0.3	0.4	0.6	0.2	0.6	-0.4
150	-0.1	-0.0	-0.1	0.1	0.5	0.5	0.5	0.6	0.8	0.3
200	-0.1	-0.0	-0.1	0.2	0.4	0.4	0.3	0.5	0.5	1.0
250	-0.0	-0.0	-0.1	0.2	0.3	0.2	0.1	0.2	0.1	1.6
300	-0.0	0.0	-0.0	0.1	0.2	0.1	0.0	-0.0	-0.4	0.9
400	0.0	0.0	-0.0	0.2	0.3	0.0	0.2	0.5	0.0	-0.1
500	0.0	0.0	-0.0	0.2	0.3	0.0	0.3	0.8	0.1	-0.0
700	0.1	0.0	0.1	0.2	0.4	0.0	0.6	1.3	0.7	0.8
850	0.0	0.1	0.1	0.3	0.3	0.1	0.8	1.6	1.3	1.5
1000	-0.0	0.0	0.1	0.2	0.2	0.0	0.7	1.7	1.9	1.9

TABLE 10d NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE APRIL

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.0	-0.0	-0.0	0.1	0.2	1.0	1.6	2.5	1.9	0.3
1	0.1	0.1	0.2	0.2	0.9	2.1	2.5	2.9	1.0	-1.4
2	0.1	0.1	0.1	0.2	0.9	2.4	3.3	4.5	3.0	0.1
5	0.1	0.1	0.1	0.2	0.7	1.8	2.6	4.4	4.4	2.0
10	-0.0	0.0	0.0	0.1	0.5	1.3	1.5	3.4	3.8	2.1
30	0.0	-0.0	0.0	0.1	0.3	0.4	0.7	1.8	0.4	-0.1
50	0.0	-0.0	0.0	0.1	0.2	0.3	0.5	0.9	-0.8	-0.7
70	-0.0	-0.0	0.0	0.1	0.2	0.3	0.5	0.7	-1.3	-1.0
100	-0.1	-0.1	-0.0	0.1	0.1	0.1	0.6	1.4	-0.5	-0.8
150	-0.0	-0.0	-0.0	0.0	-0.0	-0.2	0.7	1.9	0.1	-0.4
200	0.0	-0.0	-0.0	-0.0	-0.1	-0.4	0.8	1.9	0.4	0.2
250	0.0	-0.0	-0.0	-0.1	-0.1	-0.3	0.8	1.5	0.5	0.5
300	0.0	0.0	-0.0	-0.1	-0.1	0.1	0.5	0.9	0.6	0.5
400	0.0	0.0	-0.0	-0.0	-0.0	0.0	0.3	0.9	0.9	0.5
500	0.0	0.0	-0.0	0.0	0.0	0.0	0.2	1.1	1.2	0.6
700	0.0	0.0	0.0	0.0	0.0	0.0	0.2	1.3	1.9	1.3
850	0.0	0.0	0.0	0.0	0.1	-0.0	0.1	1.2	1.9	1.6
1000	0.1	0.0	0.1	0.0	0.0	-0.1	0.2	1.3	2.3	2.1

TABLE 10e NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE MAY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.1	-0.0	0.0	0.1	0.2	0.2	0.2	0.2	0.3	0.2
1	0.3	0.2	0.2	0.3	0.4	0.6	0.6	0.4	0.3	0.2
2	0.2	0.2	0.2	0.3	0.5	0.7	0.7	0.5	0.4	0.3
5	0.1	0.1	0.1	0.2	0.4	0.4	0.4	0.4	0.3	0.2
10	0.0	0.0	0.1	0.1	0.2	0.2	0.1	0.1	0.1	0.0
30	-0.0	-0.0	0.0	0.1	0.1	0.1	-0.0	-0.2	-0.2	-0.0
50	0.0	-0.0	0.1	0.1	0.1	0.1	-0.0	-0.2	-0.1	0.1
70	-0.0	-0.0	0.0	0.0	0.1	0.1	0.0	-0.1	0.1	0.3
100	-0.1	-0.0	-0.0	0.1	0.1	0.1	0.0	-0.0	0.4	0.4
150	-0.0	-0.0	-0.0	0.1	0.1	0.2	0.0	0.1	0.9	1.2
200	0.0	-0.0	0.0	0.0	0.1	0.2	0.1	0.2	1.4	1.6
250	0.0	-0.0	0.0	-0.0	0.1	0.1	0.1	0.2	1.4	1.5
300	0.0	0.0	0.0	-0.0	0.1	0.1	0.1	0.0	1.5	1.4
400	0.0	0.0	0.0	-0.0	0.1	0.1	0.1	0.2	0.9	0.3
500	0.0	0.0	0.0	0.0	0.1	0.1	0.1	0.4	0.8	0.6
700	0.0	0.0	0.0	0.0	0.1	0.1	0.2	0.6	1.4	1.3
850	0.0	-0.0	-0.0	-0.0	-0.0	0.0	0.2	0.6	1.5	1.7
1000	0.0	0.0	0.0	-0.0	-0.1	-0.0	0.2	0.6	1.5	1.7

TABLE 10f NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE JUNE

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.0	-0.0	0.0	-0.0	0.0	0.1	0.1	0.0	0.0	-0.0
1	0.1	0.1	0.1	0.1	0.1	0.3	0.3	0.2	0.1	0.1
2	0.1	0.1	0.1	0.1	0.2	0.4	0.3	0.2	0.2	0.3
5	-0.0	0.0	0.1	0.1	0.1	0.3	0.2	0.1	0.2	0.1
10	-0.0	-0.0	0.0	0.0	0.1	0.2	0.2	0.0	0.1	0.0
30	0.0	0.0	0.0	0.0	0.1	0.1	0.1	0.1	-0.0	-0.1
50	0.0	0.0	-0.0	0.0	0.1	0.0	0.1	0.0	-0.1	-0.1
70	0.0	-0.0	-0.0	0.1	0.1	0.0	0.1	0.0	-0.1	-0.2
100	-0.1	-0.0	0.0	0.2	0.1	0.0	0.2	0.3	0.1	-0.0
150	-0.0	-0.0	-0.0	0.1	0.1	-0.1	0.2	0.5	0.2	0.0
200	0.0	0.0	-0.1	0.0	0.0	-0.0	0.3	0.6	0.4	0.3
250	0.0	0.0	-0.0	0.0	0.0	0.1	0.4	0.4	0.5	0.6
300	0.0	0.0	-0.0	-0.0	0.0	0.2	0.4	0.1	-0.0	0.1
400	0.0	0.0	-0.0	-0.0	0.0	0.2	0.4	0.1	-0.4	-0.3
500	0.0	0.3	-0.0	-0.0	0.0	0.2	0.3	0.2	-0.2	0.0
700	0.0	0.0	-0.0	-0.0	0.0	0.2	0.2	0.3	0.1	0.3
850	0.0	0.0	0.0	-0.0	-0.0	0.2	0.2	0.4	0.6	1.0
1000	-0.0	0.0	0.0	-0.0	-0.0	0.2	0.2	0.6	0.6	0.9

TABLE 10g NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE JULY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.0	-0.0	0.0	0.0	0.1	0.0	0.0	0.1	0.1	0.1
1	0.1	0.1	0.1	0.0	0.1	0.3	0.2	0.2	0.2	0.2
2	0.1	0.1	0.0	0.1	0.2	0.3	0.3	0.2	0.1	0.1
5	-0.0	-0.0	0.0	0.1	0.1	0.2	0.2	0.2	0.2	0.1
10	-0.0	-0.0	0.0	0.1	0.1	0.2	0.2	0.3	0.2	0.2
30	-0.0	-0.0	-0.0	0.0	0.1	0.1	0.1	0.2	0.2	0.1
50	-0.0	0.0	-0.0	0.0	0.1	0.1	0.1	0.2	-0.0	-0.1
70	-0.0	0.0	0.0	0.1	0.1	0.1	0.1	0.2	0.0	-0.1
100	-0.1	-0.0	0.0	0.1	0.0	0.0	0.1	0.3	0.2	0.0
150	-0.1	-0.0	-0.0	-0.0	-0.0	0.0	0.1	0.5	0.2	0.2
200	-0.1	-0.0	-0.0	-0.0	0.0	0.1	0.1	0.6	0.5	0.2
250	-0.0	0.0	0.0	-0.0	0.0	0.1	0.1	0.6	0.5	0.3
300	0.0	0.0	-0.0	-0.1	0.0	0.0	0.1	0.4	0.4	1.3
400	0.0	0.0	-0.0	-0.1	0.0	-0.0	0.1	0.3	0.8	1.0
500	0.0	0.0	-0.0	-0.0	0.0	-0.0	0.1	0.3	1.2	2.1
700	0.0	0.0	0.0	-0.0	-0.0	-0.0	0.1	0.4	1.5	2.1
850	0.0	0.0	0.0	0.0	-0.0	-0.0	0.0	0.5	1.7	2.5
1000	0.0	0.0	0.0	0.0	-0.0	-0.0	0.1	0.6	1.4	1.9

TABLE 10h NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE AUGUST

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)										
	5	10	20	30	40	50	60	70	80	85	
0.4	0.0	-0.0	-0.0	-0.0	0.1	-0.0	0.0	0.0	0.2	0.1	0.0
1	0.0	0.1	0.0	0.1	0.1	0.3	0.4	0.4	0.1	0.1	
2	0.1	0.0	0.0	0.1	0.2	0.3	0.4	0.5	0.2	0.1	
5	0.0	0.0	-0.0	0.0	0.2	0.3	0.3	0.4	0.3	0.2	
10	0.0	0.0	-0.0	0.0	0.1	0.3	0.7	0.9	0.7	0.5	
30	0.0	-0.0	0.0	0.0	0.1	0.3	0.5	0.5	0.3	0.2	
50	0.0	-0.0	0.0	0.0	0.1	0.2	0.3	0.3	0.2	0.3	
70	0.0	0.0	0.0	0.0	0.0	0.0	0.2	0.3	0.3	0.3	
100	-0.1	-0.0	0.0	0.0	-0.0	0.2	0.2	0.4	0.4	0.4	
150	-0.1	-0.0	0.0	0.0	-0.0	0.2	0.2	0.4	0.8	0.9	
200	-0.0	0.0	-0.0	0.0	0.0	0.2	0.3	0.5	1.5	1.5	
250	0.0	0.0	-0.0	-0.0	0.0	0.2	0.2	0.5	1.7	2.3	
300	0.1	0.0	-0.0	-0.0	0.0	0.2	0.1	0.3	1.7	2.7	
400	0.1	0.0	-0.0	-0.0	-0.0	0.1	0.2	0.3	1.6	2.5	
500	0.1	0.0	-0.0	-0.0	-0.0	0.1	0.2	0.2	1.9	2.6	
700	0.0	0.0	-0.0	-0.0	0.0	0.1	0.1	0.2	2.3	3.0	
850	0.0	0.0	-0.0	-0.0	0.0	0.1	0.0	0.3	2.2	2.8	
1000	0.0	0.0	0.0	0.0	0.0	0.1	0.0	0.5	1.9	2.1	

TABLE 10i NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE SEPTEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.1	0.1	-0.0	-0.1	0.0	0.3	0.4	1.0	1.3	0.8
1	-0.0	0.0	0.1	0.2	0.2	0.5	1.5	2.6	2.6	1.6
2	0.0	0.1	0.1	0.1	0.2	0.6	1.5	3.0	3.0	1.8
5	0.0	0.0	0.0	0.1	0.1	0.4	1.0	2.0	1.7	1.0
10	-0.0	-0.0	0.0	0.1	0.2	0.3	0.8	1.2	0.6	0.4
30	0.0	-0.0	0.0	0.0	0.1	0.2	0.5	0.7	0.4	0.2
50	0.0	-0.0	0.0	0.0	0.1	0.2	0.4	0.5	0.3	0.2
70	-0.0	-0.0	0.0	0.0	0.1	0.2	0.3	0.4	0.3	0.1
100	-0.0	-0.0	0.0	0.0	0.1	0.2	0.3	0.4	0.4	0.2
150	-0.0	-0.0	-0.0	0.0	0.1	0.4	0.2	0.4	0.5	0.2
200	-0.0	0.0	-0.0	0.1	0.2	0.3	0.1	0.5	0.5	0.2
250	0.0	0.0	-0.0	0.1	0.2	0.2	0.2	0.5	0.4	0.5
300	0.0	0.0	-0.0	0.0	0.1	0.1	0.1	0.3	0.5	0.8
400	0.0	0.0	-0.0	0.0	0.1	0.1	0.0	0.3	1.4	1.3
500	0.0	0.0	0.0	0.0	0.0	0.1	-0.0	0.3	1.8	1.5
700	0.0	0.0	-0.0	-0.0	0.0	0.1	-0.0	0.3	2.1	1.8
850	0.0	0.0	-0.0	0.0	0.0	0.1	-0.1	0.4	2.2	2.2
1000	-0.0	0.0	0.0	0.0	0.0	0.1	-0.2	0.3	2.5	2.4

TABLE 10j NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE OCTOBER

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.0	0.0	-0.1	-0.5	-0.3	1.0	4.7	8.7	8.0	4.7
1	-0.1	-0.1	-0.1	0.2	1.4	6.4	13.9	18.4	13.2	7.2
2	0.0	-0.0	-0.1	-0.1	1.0	5.9	14.3	20.5	15.2	8.2
5	0.1	0.0	-0.1	-0.2	0.3	3.2	8.8	13.5	10.2	5.6
10	0.0	0.0	-0.0	-0.1	0.1	0.9	3.7	6.9	5.4	3.0
30	-0.0	-0.0	0.0	0.1	0.1	0.1	1.2	3.1	2.9	1.8
50	0.0	0.0	0.0	0.1	0.0	0.1	0.8	2.2	2.2	1.3
70	-0.0	-0.0	0.1	0.1	-0.0	0.1	0.7	2.0	1.6	0.9
100	-0.0	-0.0	0.0	0.0	0.1	0.2	0.7	1.9	1.5	1.1
150	0.0	0.0	0.0	0.1	0.3	0.4	0.6	1.5	1.1	0.9
200	0.0	0.0	-0.0	0.1	0.3	0.3	0.5	1.3	0.8	0.8
250	0.0	-0.0	-0.0	0.0	0.2	0.2	0.4	1.0	0.4	0.2
300	-0.0	-0.0	-0.0	-0.0	0.1	0.1	0.3	0.6	0.0	-1.1
400	0.0	0.0	-0.0	-0.0	0.0	0.1	0.3	0.4	0.5	-0.5
500	0.0	0.0	-0.0	-0.0	0.0	0.1	0.3	0.6	1.1	0.4
700	0.0	0.0	-0.0	0.0	0.1	0.1	0.3	0.6	1.3	0.4
850	0.0	0.0	-0.0	0.0	0.1	0.2	0.2	0.9	1.8	1.6
1000	0.0	-0.0	-0.0	-0.0	0.0	0.2	0.1	0.6	1.7	2.1

TABLE 10k NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE NOVEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.2	-0.1	-0.1	0.5	-0.2	-1.7	0.9	5.5	5.1	3.3
1	0.5	0.4	1.1	2.8	2.9	-1.4	1.1	10.7	10.7	5.7
2	0.3	0.2	0.7	2.2	2.2	-1.4	2.7	12.0	9.7	5.1
5	0.1	0.1	0.2	1.0	0.9	-0.3	3.1	7.3	3.0	0.9
10	0.0	0.0	-0.0	0.3	0.7	0.8	3.5	4.6	4.4	3.6
30	-0.0	0.0	0.1	0.1	0.1	1.0	2.5	2.4	1.8	1.0
50	0.0	0.0	0.0	0.1	0.1	0.8	1.8	1.3	0.9	0.3
70	-0.0	-0.0	0.0	-0.0	0.1	0.8	1.3	0.8	0.5	0.2
100	-0.0	0.0	0.0	0.0	0.1	0.4	1.1	0.4	-0.0	0.2
150	-0.0	-0.0	0.0	0.1	0.1	0.5	0.9	0.1	-0.2	0.0
200	-0.0	-0.0	0.0	0.1	0.1	0.5	0.8	0.1	0.4	0.8
250	0.0	0.0	0.0	0.1	0.1	0.4	0.7	0.1	1.1	1.4
300	0.0	0.0	0.0	0.1	0.1	0.3	0.6	0.1	1.5	1.6
400	0.0	0.0	0.0	0.0	0.1	0.2	0.4	0.4	1.6	1.0
500	0.0	0.0	0.0	0.0	0.1	0.2	0.3	0.6	1.8	1.2
700	0.0	0.0	0.0	0.1	0.2	0.2	0.2	0.8	2.0	1.6
850	0.0	0.0	0.0	0.1	0.2	0.1	0.2	0.9	2.7	2.3
1000	-0.0	-0.0	0.0	0.1	0.2	-0.0	-0.0	0.5	2.9	2.5

TABLE 10l NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE DECEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.1	0.0	-0.2	-0.4	0.5	3.8	6.5	9.2	7.7	4.4
1	0.0	0.1	0.7	2.7	6.1	9.8	15.8	28.1	26.4	15.1
2	0.0	0.1	0.4	2.0	4.7	9.9	16.5	26.7	22.8	13.0
5	0.0	0.0	0.1	0.8	2.0	5.6	12.3	20.0	14.5	7.7
10	0.0	0.0	-0.0	-0.0	0.7	1.6	4.0	7.3	5.5	3.0
30	-0.0	0.0	0.0	0.0	0.2	0.6	2.3	2.7	0.5	0.2
50	-0.0	-0.0	0.0	-0.0	0.1	0.6	1.6	0.8	-2.0	-1.8
70	-0.0	-0.0	-0.0	-0.0	0.1	0.5	1.4	0.5	-2.5	-2.1
100	-0.1	-0.1	-0.0	0.0	0.1	0.4	1.3	0.4	-3.7	-2.8
150	-0.1	-0.0	0.0	0.1	0.1	0.5	1.4	0.2	-3.3	-1.9
200	-0.0	0.0	0.0	0.1	-0.1	0.4	1.2	0.3	-2.8	-1.1
250	-0.0	0.0	-0.0	0.1	-0.1	0.3	0.8	0.6	-1.8	-0.7
300	0.0	0.0	-0.0	0.1	-0.0	0.1	0.4	1.0	-0.3	-0.0
400	0.0	0.1	-0.0	0.1	0.0	0.2	0.7	1.4	1.6	0.6
500	0.0	0.0	0.0	0.1	0.1	0.3	0.9	1.5	2.6	1.6
700	0.0	0.0	0.0	0.0	0.1	0.3	1.1	1.6	3.4	3.3
850	0.0	0.0	0.0	0.0	0.1	0.3	1.2	1.5	4.3	4.5
1000	0.0	0.0	0.1	-0.0	0.1	0.4	1.2	1.0	4.3	4.5

TABLE // a NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE JANUARY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.2	-0.0	0.1	0.1	0.9	5.5	9.3	5.3	1.1	0.1
1	0.1	0.2	0.7	3.1	11.0	19.7	17.5	6.4	0.9	-0.2
2	0.1	0.2	0.7	2.6	9.6	19.5	21.5	11.4	2.2	0.2
5	0.0	0.1	0.3	0.9	4.6	12.5	19.8	14.9	3.6	0.7
10	-0.0	-0.0	-0.2	-0.3	1.9	9.3	16.3	13.5	2.9	0.4
30	-0.0	-0.0	0.0	0.2	0.9	4.3	8.3	5.2	0.4	0.1
50	-0.0	-0.0	0.1	0.1	0.3	2.0	4.0	2.3	-0.1	0.0
70	-0.0	0.0	0.1	-0.0	0.1	1.3	2.5	1.1	0.1	0.1
100	-0.1	-0.0	-0.0	0.0	0.1	1.1	2.1	1.2	0.5	0.1
150	-0.1	-0.0	0.0	0.0	0.1	1.1	1.7	1.1	0.7	0.2
200	0.0	0.0	0.1	0.2	0.0	0.9	1.7	0.9	0.5	0.3
250	0.0	0.1	0.1	0.2	0.0	1.0	1.6	0.7	0.2	0.3
300	0.0	0.1	0.2	0.2	0.1	1.1	1.6	1.2	0.4	0.4
400	0.0	0.1	0.1	0.2	0.3	0.8	1.6	2.0	1.3	0.5
500	0.0	0.1	0.1	0.2	0.4	0.7	1.7	2.4	1.9	0.6
700	0.0	0.1	0.1	0.2	0.5	0.7	1.6	2.5	1.9	0.7
850	0.0	0.1	0.2	0.2	0.5	1.0	2.2	2.5	2.1	0.6
1000	0.0	0.1	0.2	0.2	0.5	1.2	2.5	1.9	2.0	0.6

TABLE // b NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE FEBRUARY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.3	-0.1	0.1	0.0	3.0	9.1	11.6	6.4	0.7	0.0
1	0.1	0.1	0.4	2.0	7.3	17.8	24.2	14.9	2.1	0.1
2	0.1	0.1	0.4	2.1	8.3	20.5	26.9	14.8	1.2	0.1
5	0.0	0.1	0.3	1.2	5.3	14.5	20.8	13.2	2.1	0.4
10	0.0	0.0	0.0	0.3	2.3	8.6	12.3	3.1	-2.0	-0.4
30	-0.0	-0.1	-0.1	0.1	0.6	1.7	5.4	6.4	1.4	0.2
50	-0.0	0.0	0.0	-0.0	0.1	0.7	5.0	6.4	1.5	0.1
70	-0.0	0.0	-0.0	-0.1	0.0	0.3	4.3	5.7	1.7	0.3
100	0.1	-0.1	-0.2	-0.1	0.1	0.3	3.6	4.9	1.7	0.4
150	-0.0	-0.1	-0.0	0.1	0.5	0.3	2.8	3.9	2.1	0.5
200	-0.0	-0.0	-0.1	0.2	1.0	0.3	2.8	3.2	1.8	0.5
250	-0.0	-0.0	-0.1	0.3	0.9	0.2	2.2	2.0	1.1	0.4
300	-0.0	-0.0	-0.0	0.3	0.7	0.2	0.9	0.9	0.8	0.3
400	0.0	0.0	0.0	0.3	0.5	0.3	0.3	1.0	1.3	0.3
500	0.0	0.0	0.0	0.3	0.6	0.5	0.5	1.5	1.5	0.5
700	0.0	0.0	0.0	0.2	0.8	0.9	0.9	2.3	1.6	0.5
850	-0.0	0.0	0.0	0.2	0.8	1.1	1.6	2.5	2.0	0.6
1000	-0.0	-0.0	-0.0	0.1	0.7	1.1	1.4	1.9	2.0	0.2

TABLE // c NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE MARCH

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.0	-0.0	-0.2	-0.1	0.9	2.7	4.3	3.5	1.0	0.1
1	0.3	0.2	0.2	0.5	1.8	3.8	6.2	4.7	1.6	0.2
2	0.2	0.2	0.1	0.3	2.2	4.8	8.6	7.0	1.9	0.2
5	0.2	0.2	0.1	0.2	1.8	4.5	9.0	7.5	1.1	0.1
10	-0.0	-0.0	0.0	0.2	1.5	5.6	10.1	7.8	2.1	0.5
30	-0.0	-0.0	0.0	0.2	0.7	2.3	5.9	5.5	1.1	0.3
50	-0.0	-0.0	0.0	0.2	0.6	1.4	3.7	3.5	0.7	0.1
70	-0.0	-0.1	-0.1	0.1	0.4	1.3	2.9	2.3	0.5	0.0
100	-0.1	0.0	-0.2	0.2	0.4	1.4	2.7	1.3	0.2	0.1
150	-0.1	0.0	-0.1	0.3	0.6	1.6	2.4	0.7	-0.3	0.0
200	-0.0	0.0	0.0	0.4	0.6	1.7	2.3	0.6	-0.6	-0.2
250	-0.0	0.0	0.0	0.4	0.4	1.4	1.9	0.4	-0.8	-0.4
300	0.0	0.0	0.0	0.2	0.4	1.0	1.3	0.6	-0.4	-0.3
400	-0.0	0.0	0.1	0.2	0.4	0.7	1.3	1.4	0.6	-0.0
500	-0.0	-0.0	0.0	0.1	0.5	0.8	1.4	1.6	1.2	0.3
700	0.0	0.0	0.0	0.1	0.3	0.8	1.5	2.1	1.7	0.7
850	-0.0	0.0	0.0	0.1	0.2	0.7	1.7	2.4	2.1	0.7
1000	0.1	-0.0	0.0	0.1	0.2	0.6	1.8	2.8	2.1	0.7

TABLE // d NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE APRIL

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.2	-0.1	-0.0	-0.0	0.1	0.5	0.8	0.4	-0.2	-0.2
1	0.2	0.1	0.1	0.1	0.4	1.3	1.9	1.0	-0.9	-0.6
2	0.0	0.0	0.1	0.1	0.5	1.4	2.1	1.3	-0.5	-0.4
5	0.0	0.0	0.1	0.1	0.4	1.0	2.2	2.0	0.5	-0.0
10	0.0	0.0	-0.0	0.1	0.4	1.4	2.7	2.6	1.0	0.2
30	-0.0	0.0	0.0	0.2	0.4	1.4	3.0	3.0	0.9	0.2
50	-0.0	-0.0	0.0	0.3	0.5	1.3	2.9	3.0	0.9	0.2
70	-0.0	-0.0	-0.0	0.1	0.4	1.3	2.7	2.7	0.7	0.2
100	-0.2	-0.1	-0.0	0.1	0.4	1.2	2.2	2.0	0.5	0.2
150	-0.1	-0.0	-0.0	0.2	0.6	1.3	1.7	1.5	0.5	0.2
200	-0.0	-0.0	0.0	0.2	0.4	1.2	1.6	1.0	0.5	0.2
250	-0.0	-0.0	0.0	0.1	0.2	0.9	1.4	0.6	0.4	0.1
300	0.0	0.0	0.0	0.1	0.2	0.7	1.1	0.4	0.4	0.1
400	0.0	0.0	0.0	0.0	0.2	0.5	0.8	1.4	0.7	0.0
500	0.0	0.0	0.0	0.0	0.3	0.5	0.9	2.0	1.0	0.2
700	0.0	0.0	0.0	0.1	0.4	0.4	1.0	2.4	1.5	0.4
850	-0.0	-0.0	0.0	0.2	0.5	0.6	1.2	3.0	1.8	0.5
1000	-0.0	-0.0	0.0	0.2	0.4	0.5	0.9	3.2	2.0	0.6

TABLE // e NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE MAY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.0	-0.0	-0.0	0.0	0.1	-0.0	0.1	0.1	0.0	0.0
1	0.0	0.1	0.1	0.2	0.2	0.3	0.4	0.1	-0.1	-0.0
2	-0.0	0.0	0.0	0.2	0.2	0.3	0.4	0.3	-0.0	-0.0
5	-0.0	0.0	0.0	0.1	0.2	0.4	0.5	0.3	-0.0	-0.0
10	-0.0	-0.0	0.0	0.0	0.2	0.5	0.7	0.5	0.0	-0.0
30	-0.0	0.0	0.0	0.0	0.1	0.3	0.4	0.3	0.1	-0.0
50	0.0	-0.0	0.0	0.0	0.1	0.2	0.3	0.3	0.1	0.0
70	0.0	-0.0	0.0	0.0	0.1	0.2	0.4	0.4	0.2	0.0
100	-0.1	0.0	0.0	0.1	0.2	0.4	0.5	0.3	0.1	
150	-0.1	-0.0	0.0	0.3	0.3	0.4	0.6	0.6	0.1	
200	-0.0	-0.0	-0.0	0.3	0.4	0.5	0.4	0.5	0.9	0.2
250	0.1	0.0	-0.0	0.2	0.4	0.5	0.3	0.4	0.9	0.2
300	0.1	-0.0	-0.0	0.1	0.3	0.4	0.4	0.6	1.3	0.2
400	0.0	-0.0	-0.0	0.1	0.3	0.3	0.4	0.8	1.4	0.2
500	0.0	0.0	-0.0	0.1	0.2	0.2	0.4	1.0	1.2	0.0
700	0.0	0.0	0.0	0.0	0.2	0.2	0.3	1.2	1.6	0.3
850	0.0	0.0	0.0	0.1	0.1	0.2	0.3	1.7	1.8	0.3
1000	0.1	-0.0	0.0	0.1	-0.0	0.2	0.4	2.2	1.5	0.5

TABLE // f NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE JUNE

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.0	-0.0	-0.0	0.0	-0.0	0.0	-0.0	0.0	-0.1	0.0
1	0.0	0.0	0.0	0.0	0.0	0.0	0.1	-0.0	0.0	0.0
2	0.0	-0.0	0.0	0.0	0.0	0.0	0.0	0.0	-0.0	-0.0
5	0.0	-0.0	-0.0	0.0	0.0	0.0	0.0	0.0	-0.0	-0.0
10	0.0	0.0	0.0	0.0	-0.0	-0.0	0.1	0.2	-0.0	-0.0
30	-0.0	-0.0	0.0	-0.0	0.1	0.1	0.1	0.0	0.1	0.1
50	-0.0	-0.0	0.0	-0.1	0.0	0.1	0.1	0.0	0.1	0.0
70	-0.0	-0.0	-0.0	-0.0	-0.0	0.1	0.1	0.1	0.1	0.0
100	-0.0	0.0	0.0	-0.0	0.3	0.3	0.3	0.1	0.1	0.1
150	-0.0	-0.0	-0.0	-0.1	0.5	0.6	0.8	0.5	0.2	0.1
200	0.0	0.0	-0.0	0.1	0.5	0.8	1.0	0.6	0.2	0.1
250	0.0	0.0	-0.0	0.2	0.3	0.8	0.7	0.4	0.3	0.0
300	0.0	0.0	-0.0	0.1	0.2	0.7	0.5	0.4	0.8	0.1
400	0.1	0.0	-0.0	0.1	0.0	0.6	0.4	0.7	0.9	0.1
500	0.0	0.0	-0.0	0.1	0.0	0.5	0.3	0.9	0.9	0.2
700	0.0	0.0	-0.0	0.1	0.1	0.3	0.1	0.9	1.0	0.2
850	-0.0	-0.0	0.0	0.1	0.1	0.2	0.1	1.2	0.9	0.1
1000	0.0	0.0	0.0	0.1	0.1	0.2	-0.0	1.3	0.6	-0.2

TABLE //g NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVELENGTH 2 FOR 4-YEAR (1979-1982) AVERAGE JULY

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.0	-0.0	-0.0	-0.0	0.0	-0.0	0.0	0.0	-0.0	-0.0
1	-0.1	-0.0	-0.0	-0.0	-0.0	-0.0	0.0	-0.0	-0.0	0.0
2	-0.1	-0.0	-0.0	-0.0	0.0	-0.0	0.0	-0.0	-0.0	-0.0
5	-0.0	-0.0	0.0	-0.0	0.0	0.0	0.0	0.0	-0.0	-0.0
10	-0.0	-0.0	0.0	0.0	0.0	0.0	0.1	0.0	0.0	-0.0
30	0.0	0.0	0.0	0.1	0.1	0.0	0.0	0.0	0.0	0.0
50	-0.0	0.0	0.0	0.1	0.1	0.1	0.1	0.1	0.0	0.0
70	-0.0	-0.0	0.0	0.1	0.1	0.0	0.1	0.1	0.0	0.0
100	0.0	0.0	0.0	-0.0	0.1	0.1	0.2	0.2	0.1	0.1
150	-0.1	-0.0	0.0	0.0	0.2	0.2	0.4	0.3	0.2	0.1
200	-0.0	-0.0	0.0	0.0	0.2	0.3	0.7	0.4	0.6	0.3
250	0.0	0.0	0.0	-0.0	0.1	0.1	0.8	0.7	0.9	0.4
300	0.0	0.0	0.0	-0.1	0.1	0.1	0.7	0.9	1.2	0.4
400	0.0	0.0	0.0	-0.0	0.0	0.0	0.6	0.8	1.2	0.5
500	0.0	-0.0	0.0	-0.0	0.0	0.0	0.5	0.7	1.2	0.5
700	0.0	-0.0	-0.0	-0.0	-0.0	0.0	0.3	0.7	1.3	0.5
850	0.0	-0.0	-0.0	-0.0	-0.0	0.1	0.3	1.1	1.6	0.4
1000	0.0	-0.0	0.0	-0.0	0.0	0.2	0.2	1.4	1.1	0.0

TABLE //h NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVELENGTH 2 FOR 4-YEAR (1979-1982) AVERAGE SEPTEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.0	-0.0	-0.0	-0.1	-0.1	0.2	0.4	0.5	0.2	0.0
1	0.0	0.0	0.0	0.0	0.2	0.5	1.1	1.2	0.3	0.0
2	0.1	0.0	0.0	0.0	0.1	0.6	1.3	1.3	0.3	0.0
5	0.0	0.0	0.0	0.0	0.0	0.4	0.9	1.0	0.3	0.0
10	0.0	0.0	0.0	0.1	0.1	0.6	1.5	1.4	0.5	0.1
30	0.0	0.0	0.0	0.1	0.1	0.5	1.0	0.5	0.2	0.0
50	-0.0	0.0	0.1	0.1	0.1	0.4	0.8	0.5	0.1	-0.0
70	-0.0	-0.0	0.0	0.1	-0.0	0.3	0.7	0.4	0.1	0.0
100	-0.1	-0.0	0.0	0.1	0.0	0.4	0.7	0.5	0.1	0.0
150	-0.1	-0.0	0.0	0.0	0.1	0.5	0.8	0.8	0.1	0.0
200	-0.0	0.0	0.0	0.0	0.1	0.4	0.9	1.0	-0.1	-0.1
250	0.0	0.0	0.0	-0.0	0.0	0.3	1.0	1.0	-0.2	-0.2
300	0.0	0.0	0.0	-0.1	0.0	0.3	1.0	0.9	0.1	-0.3
400	0.0	0.0	0.0	-0.0	0.0	0.3	0.9	1.1	0.8	0.1
500	0.0	0.0	0.0	-0.0	0.0	0.3	0.9	1.3	1.1	0.2
700	-0.0	0.0	0.0	-0.0	0.1	0.2	0.9	1.5	1.4	0.4
850	0.0	-0.0	-0.0	0.0	0.1	0.3	1.1	1.6	1.5	0.4
1000	0.0	-0.0	-0.0	0.0	0.2	0.2	1.0	1.4	1.0	0.2

TABLE //i NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVELENGTH 2 FOR 4-YEAR (1979-1982) AVERAGE NOVEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.1	-0.0	-0.2	-0.1	1.0	2.7	3.4	2.4	0.6	0.1
1	0.2	0.2	0.6	1.2	2.1	3.6	4.2	2.2	0.9	0.2
2	0.1	0.1	0.3	1.0	2.2	4.1	5.6	3.2	0.9	0.2
5	0.0	0.1	0.1	0.5	1.3	2.9	4.5	2.8	0.4	0.0
10	0.0	-0.0	-0.1	0.3	0.4	1.1	3.1	1.6	0.2	-0.0
30	0.0	-0.0	0.0	0.2	0.3	0.6	0.8	0.1	-0.3	-0.1
50	0.0	0.0	0.1	0.2	0.2	0.6	1.0	0.2	-0.2	-0.0
70	0.0	0.0	0.0	0.2	0.3	0.8	1.0	0.3	-0.0	-0.0
100	-0.1	-0.0	0.0	0.1	0.3	1.0	0.8	0.0	0.1	-0.0
150	-0.1	-0.0	0.1	0.2	0.2	1.0	0.8	0.1	0.1	-0.0
200	-0.0	-0.0	0.1	0.2	0.1	0.9	0.7	-0.0	0.3	0.1
250	-0.0	-0.0	0.0	0.2	0.1	0.7	0.4	-0.2	0.5	0.2
300	-0.0	0.0	0.0	0.1	0.1	0.7	0.2	0.3	0.6	0.2
400	-0.0	-0.0	0.0	0.1	0.2	0.7	0.2	1.1	0.8	0.2
500	0.0	-0.0	0.0	0.0	0.3	0.7	0.3	1.6	1.1	0.3
700	0.0	0.0	0.0	0.0	0.4	0.9	0.5	1.9	1.3	0.4
850	0.0	-0.0	0.0	0.1	0.5	0.7	0.7	2.3	1.4	0.4
1000	0.1	0.0	-0.0	-0.0	0.4	0.4	0.2	1.2	1.1	0.7

TABLE //k NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVELENGTH 2 FOR 4-YEAR (1979-1982) AVERAGE AUGUST

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
1	0.0	0.0	0.1	0.1	0.1	0.1	0.1	0.1	0.0	0.0
2	0.0	0.0	0.1	0.1	0.1	0.2	0.2	0.1	0.0	0.0
5	0.0	0.0	0.1	0.1	0.1	0.1	0.1	0.1	0.0	-0.0
10	0.0	0.0	0.1	0.1	0.1	0.1	0.1	0.1	0.0	-0.0
30	0.0	0.0	0.0	0.0	0.1	0.1	0.2	0.2	-0.0	-0.0
50	0.0	0.0	0.0	0.0	0.1	0.2	0.3	0.3	-0.1	-0.0
70	-0.0	-0.0	0.0	-0.0	0.0	0.3	0.4	0.4	-0.0	-0.0
100	-0.1	0.0	0.0	0.0	0.0	0.4	0.6	0.5	-0.1	-0.0
150	-0.1	-0.0	0.0	0.0	0.0	0.7	0.8	0.5	-0.1	0.0
200	-0.0	-0.0	-0.0	0.0	-0.0	1.0	1.0	0.5	-0.2	0.0
250	0.0	-0.0	-0.0	0.0	0.0	0.7	0.9	0.4	-0.1	-0.2
300	0.0	-0.0	-0.0	0.0	0.0	0.4	0.8	0.7	0.0	-0.2
400	0.0	0.0	-0.0	0.0	0.0	0.2	0.7	1.0	1.1	0.2
500	0.0	0.0	-0.0	0.0	0.0	0.2	0.6	1.1	1.6	0.5
700	-0.0	-0.0	-0.0	0.0	0.0	0.2	0.5	1.4	1.9	0.6
850	0.0	-0.0	0.0	0.0	0.1	0.3	0.6	1.8	1.7	0.4
1000	0.0	0.0	0.0	0.1	0.0	0.3	0.3	2.1	1.3	0.3

TABLE //j NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVELENGTH 2 FOR 4-YEAR (1979-1982) AVERAGE OCTOBER

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.0	0.0	0.1	-0.1	-0.1	0.6	0.9	0.9	0.4	0.1
1	0.0	-0.0	-0.0	0.0	0.4	2.0	3.4	2.1	0.6	0.1
2	0.0	-0.0	0.0	-0.1	0.3	1.9	3.6	2.7	0.8	0.1
5	0.0	-0.0	-0.0	-0.1	0.2	1.3	2.8	2.6	0.7	0.1
10	0.0	0.0	-0.1	0.1	0.4	1.4	3.1	2.1	0.4	0.2
30	-0.0	-0.0	0.1	0.1	0.3	1.0	2.2	1.8	0.4	0.1
50	-0.0	0.0	0.1	0.1	0.2	0.7	1.6	1.5	0.3	0.1
70	-0.0	-0.0	0.1	0.1	0.2	0.7	1.4	1.3	0.3	0.1
100	-0.2	-0.1	0.1	0.1	0.3	0.6	1.3	1.1	0.3	0.0
150	-0.1	-0.1	0.0	0.2	0.4	0.5	1.2	0.9	0.3	0.1
200	0.0	-0.0	-0.0	0.1	0.4	0.3	1.3	0.9	0.3	0.1
250	0.1	0.0	-0.0	0.1	0.3	0.2	1.0	1.1	0.3	-0.0
300	0.0	0.0	-0.0	0.0	0.1	0.3	0.7	1.0	0.6	0.2
400	0.0	0.0	-0.0	0.0	0.1	0.4	0.5	1.4	1.3	0.3
500	0.0	0.0	-0.0	0.0	0.1	0.4	0.4	1.6	1.8	0.4
700	-0.0	0.0	-0.0	0.0	0.1	0.3	0.4	2.1	2.0	0.5
850	0.0	0.0	-0.0	0.0	0.2	0.3	0.3	2.1	2.2	0.6
1000	0.0	0.0	-0.0	-0.0	0.2	0.3	0.1	1.2	2.5	0.9

TABLE //l NORTHWARD FLUX OF HEAT ($^{\circ}\text{K M/S}$) BY THE TRANSIENT EDDIES OF THE ZONAL WAVELENGTH 2 FOR 4-YEAR (1979-1982) AVERAGE DECEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}\text{N}$)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.1	-0.1	-0.2	-0.1	0.4	1.5	1.3	-0.1	-0.2	0.0
1	0.1	0.1	0.4	2.3	4.5	3.2	2.3	-0.8	-0.7	0.1
2	0.0	0.0	0.3	2.1	4.7	4.4	2.8	-1.2	-0.7	-0.1
5	0.0	-0.0	0.1	1.2	3.2	4.3	3.2	-0.4	-0.4	-0.1
10	-0.0	-0.0	0.0	0.5	2.5	3.1	1.5	-0.8	-0.9	-0.2
30	-0.0	-0.0	-0.0	0.2	0.7	1.0	0.2	-0.7	-0.7	-0.1
50	-0.0	-0.0	0.0	0.2	0.3	0.9	0.8	-0.4	-0.6	-0.2
70	-0.0	0.0	0.1	0.1	0.2	1.0	1.0	-0.3	-0.6	-0.2
100	-0.1	-0.0	0.1	0.2	0.4	1.0	1.1	-0.7	-0.8	0.2
150	-0.0	-0.0	0.1	0.3	0.4	1.2	1.0	-1.2	-1.0	-0.3
200	0.0	-0.0	-0.0	0.1	0.3	1.1	0.6	-1.4	-0.7	-0.3
250	-0.0	-0.0	-0.1	-0.0	0.3	0.9	0.6	-1.0	-0.4	-0.3
300	0.0	-0.0	-0.1	-0.1	0.2	0.8	0.7	-0.4	0.1	0.0
400	0.0	-0.0	-0.1	0.0	0.2	0.6	1.2	1.6	0.8	0.1
500	0.0	0.0	-0.0	-0.0	0.2	0.7	1.7	2.7	1.1	0.1
700	0.1	0.0	-0.0	0.1	0.2	0.9	2.0	4.0	2.0	0.5
850	0.1	0.0	0.0	0.1	0.2	0.8	2.3	4.3	2.0	0.3
1000	0.1	0.0	0.0	0.0	0.1	0.4	1.7	3.8	1.6	0.0

TABLE 12a NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE STANDING EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JANUARY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	126.0	9.7	-27.5	58.0	177.5	295.0	206.6	176.9	74.1	20.4
1	100.7	7.8	-25.5	46.4	137.2	250.7	222.2	194.9	82.4	18.0
2	80.7	7.4	-23.6	38.3	109.0	218.1	244.2	219.5	93.3	15.9
5	71.1	10.8	-21.2	25.7	73.0	156.0	227.1	199.9	79.8	5.3
10	72.1	15.7	-16.7	15.6	44.1	94.1	158.3	137.5	50.2	-4.5
30	56.7	19.3	-7.0	6.1	11.8	8.3	31.5	30.7	8.2	-11.0
50	42.3	16.8	-1.5	5.6	5.9	-10.4	-2.1	2.2	-2.2	-10.6
70	29.5	19.2	2.3	8.0	5.3	-15.1	-15.4	-8.4	-4.8	-9.1
100	6.2	6.2	4.7	13.9	7.6	-15.7	-22.4	-13.8	-5.8	-7.2
150	-12.1	-1.9	7.5	19.9	12.2	-14.2	-26.0	-15.4	-5.1	-5.0
200	-13.6	-4.1	9.7	19.1	13.2	-13.5	-28.3	-15.6	-3.5	-3.5
250	-14.0	-4.3	9.6	15.3	9.9	-13.2	-29.9	-15.3	-2.4	-2.6
300	-13.0	-3.5	8.5	11.8	5.7	-12.3	-29.2	-14.0	-1.7	-1.8
400	-9.6	-1.0	6.0	7.5	1.5	-8.7	-23.1	-10.5	-0.8	-0.5
500	-5.4	0.7	4.3	4.7	1.0	-5.1	-16.2	-7.3	0.1	0.3
700	-1.4	-0.3	1.9	1.2	1.1	-1.2	-5.6	-2.6	1.6	1.2
850	-2.7	-0.7	0.7	-0.8	0.8	-0.3	-0.6	0.9	2.5	1.9
1000	-8.5	0.9	-0.1	-1.8	0.1	-0.7	4.3	4.9	4.0	2.7

TABLE 12b NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE STANDING EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE FEBRUARY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	139.6	18.6	-18.0	15.8	44.8	77.0	94.6	100.8	29.8	3.8
1	104.5	12.6	-20.7	8.1	29.0	62.4	97.5	110.2	47.2	6.4
2	75.5	8.1	-22.4	2.2	16.8	52.8	103.2	120.3	63.4	7.5
5	65.5	7.7	-23.1	-4.1	7.2	39.8	103.9	123.6	71.6	5.9
10	67.0	12.7	-16.8	-3.2	6.9	31.3	75.5	92.2	64.5	4.4
30	49.4	16.8	-5.0	-0.1	8.7	9.2	20.8	26.3	32.8	0.1
50	34.5	13.5	-3.7	1.9	8.6	-1.2	5.4	9.4	16.4	-1.9
70	24.4	10.6	-3.5	5.3	9.1	-5.3	-2.8	3.2	9.3	-2.2
100	7.5	4.8	-2.6	11.2	11.0	-6.8	-8.5	-0.2	4.4	-1.9
150	-3.8	-0.6	0.5	18.3	14.6	-6.5	-12.7	-2.6	1.2	-1.2
200	-8.2	-1.6	3.6	19.6	15.6	-6.4	-15.6	-4.3	0.3	-0.8
250	-9.8	-1.4	4.7	16.3	12.9	-6.6	-17.7	-5.9	0.5	-0.4
300	-9.3	-0.8	4.5	12.2	9.0	-6.4	-18.0	-6.7	1.0	0.0
400	-5.9	0.1	3.1	6.8	5.4	-4.0	-15.0	-5.9	1.5	0.2
500	-0.4	0.9	1.9	3.6	4.8	-1.5	-10.6	-4.4	1.4	0.1
700	1.4	0.1	0.8	0.5	3.3	1.5	-3.4	-2.6	0.9	-0.2
850	-1.9	-0.5	0.7	-0.5	1.6	1.8	-0.3	-0.3	0.7	0.0
1000	-11.9	0.1	-0.6	-0.9	1.0	0.4	2.8	2.5	2.0	1.3

TABLE 12c NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE STANDING EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MARCH

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	271.3	30.7	1.2	26.0	50.0	75.2	94.7	7.7	-47.2	-33.0
1	251.9	26.5	-3.7	19.9	39.6	59.3	34.5	18.3	-14.3	-13.4
2	233.0	25.0	-7.4	15.7	31.3	50.5	39.8	27.5	12.4	1.4
5	215.3	22.5	-12.1	8.2	15.9	31.7	37.2	29.2	26.7	7.7
10	205.9	25.3	-8.3	3.9	6.5	19.5	25.6	21.7	17.7	2.8
30	165.1	26.8	0.1	0.7	1.8	3.7	1.6	-1.1	-2.8	-4.9
50	134.0	22.1	0.6	1.4	2.4	-2.9	-7.6	-9.6	-5.8	-4.6
70	115.7	20.0	0.7	4.1	3.8	-5.5	-11.3	-12.2	-5.9	-3.3
100	70.8	14.5	1.0	10.2	6.8	-6.1	-12.8	-12.5	-5.5	-2.0
150	22.8	6.0	4.1	18.8	11.9	-5.0	-12.5	-11.0	-4.6	-0.9
200	6.5	2.5	7.5	21.3	14.3	-4.1	-12.4	-9.8	-4.0	-0.2
250	-2.2	1.4	9.1	19.2	13.5	-3.3	-13.0	-9.9	-3.6	0.1
300	-7.4	1.6	9.2	15.8	11.6	-2.2	-13.3	-10.4	-3.5	0.3
400	-9.6	2.5	7.1	9.9	9.3	0.3	-11.3	-9.2	-3.3	0.3
500	-6.6	2.6	4.8	6.0	8.3	2.2	-8.0	-6.4	-3.1	0.1
700	-2.9	2.0	1.5	2.2	6.0	3.7	-2.1	-1.9	-2.0	-0.2
850	-5.6	0.5	0.7	1.0	3.9	3.6	1.1	0.6	-1.8	-0.6
1000	-14.4	-2.0	-0.9	-0.1	2.5	2.9	4.9	1.6	-1.6	-0.3

TABLE 12d NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE STANDING EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE APRIL

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	120.3	-6.6	-24.9	-4.7	-2.7	4.8	3.3	-21.3	35.5	38.3
1	127.3	-5.4	-22.6	-3.8	-2.4	3.0	1.9	-19.0	14.0	21.4
2	130.5	-4.6	-21.0	-2.9	-1.5	4.1	4.3	-13.9	-0.6	8.3
5	137.6	0.2	-20.6	-3.2	0.2	6.2	10.7	-3.2	3.0	1.8
10	134.4	6.5	-11.7	-2.6	1.0	6.1	10.8	8.7	-1.7	0.7
30	101.3	11.8	2.3	-2.6	0.0	-0.1	1.6	-2.6	-4.6	-2.2
50	77.7	9.8	1.9	-1.9	-0.8	-2.7	-2.0	-3.4	-4.3	-2.0
70	61.1	8.0	1.2	-0.5	-1.4	-3.4	-3.3	-3.4	-3.4	-1.4
100	36.9	4.2	1.8	3.0	-1.4	-3.4	-3.6	-2.9	-2.9	-0.9
150	15.0	0.3	4.5	8.6	0.8	-2.4	-2.6	-2.1	-2.4	-0.4
200	3.2	-0.9	6.8	10.3	2.2	-1.9	-1.5	-1.0	-2.0	-0.1
250	-2.8	-0.7	7.6	9.6	2.2	-2.4	-1.3	-0.4	-2.0	-0.1
300	-5.0	-0.2	7.2	8.4	2.3	-2.7	-1.8	-0.6	-2.3	-0.3
400	-5.0	0.8	5.6	6.0	3.1	-1.9	-2.0	-1.0	-2.3	-0.2
500	-3.6	1.4	3.9	3.9	3.7	-0.6	-1.7	-0.8	-1.5	0.0
700	-3.6	1.0	0.7	1.5	3.0	1.4	-0.0	-0.1	-0.3	0.2
850	-6.1	-0.0	-0.2	0.9	2.0	1.9	1.1	0.4	-0.3	-0.0
1000	-8.5	-2.3	-1.3	-0.7	1.4	1.5	2.1	0.9	-0.2	0.1

TABLE 12e NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE STANDING EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MAY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	84.6	-2.1	-26.4	7.8	6.6	-3.7	0.3	-1.2	1.6	1.5
1	80.0	-2.8	-26.4	7.4	6.6	-4.1	0.9	-0.5	2.2	1.5
2	80.4	-1.7	-26.2	6.6	6.6	-4.1	1.7	0.0	2.9	1.5
5	76.4	0.1	-25.0	4.6	6.4	-4.1	3.0	0.3	3.6	1.6
10	71.9	5.2	-15.1	3.2	4.8	-3.4	1.2	0.1	2.9	1.4
30	51.0	10.4	-1.1	-1.6	1.7	-1.6	-0.6	0.1	0.8	0.3
50	33.6	8.4	-0.7	-4.4	-0.1	-1.5	-0.9	-0.3	0.4	-0.1
70	22.2	7.8	-1.4	-6.7	-2.1	-2.2	-1.7	-1.0	0.2	-0.3
100	12.5	7.7	0.5	-6.3	-3.7	-3.4	-3.0	-2.0	-0.1	-0.6
150	3.8	4.5	6.1	1.0	-2.4	-3.9	-4.9	-3.7	-0.6	-0.8
200	-0.2	1.9	8.0	5.4	-0.9	-3.8	-7.3	-5.5	-1.0	-0.8
250	-1.5	1.2	7.3	5.8	0.1	-3.6	-9.9	-7.4	-1.2	-0.8
300	-2.6	1.1	6.0	5.6	1.2	-3.2	-11.5	-8.4	-1.5	-0.7
400	-3.7	1.2	4.1	5.9	3.2	-2.3	-10.9	-7.5	-1.9	-0.5
500	3.8	1.3	3.4	5.9	4.3	-1.4	-8.6	-5.6	-1.7	-0.3
700	-2.6	0.8	1.6	3.6	3.7	0.4	-4.2	-2.5	-1.1	-0.3
850	-3.6	-0.9	-0.2	2.3	3.4	1.2	-1.6	-1.1	-1.1	-0.3
1000	-7.2	-5.0	-2.0	1.6	2.8	1.2	0.5	-0.4	-1.2	-0.2

TABLE 12f NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE STANDING EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JUNE

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	34.5	-16.7	-16.6	4.3	6.6	-2.2	2.7	-0.1	-0.2	0.5
1	32.3	-15.9	-16.9	4.4	6.7	-2.5	3.7	0.4	0.3	0.6
2	29.5	-15.2	-17.3	4.6	6.6	-2.8	4.6	0.7	0.8	0.7
5	22.7	-13.9	-18.1	4.3	6.1	-3.1	5.8	1.0	1.4	0.9
10	21.7	-9.2	-11.7	2.1	4.6	-1.8	2.6	0.8	1.0	1.0
30	16.4	-1.1	-1.9	-3.4	2.8	0.3	-0.1	0.9	-0.7	0.3
50	9.3	0.7	0.8	-3.5	1.4	0.2	0.3	1.3	-0.8	0.1
70	6.9	1.9	2.7	-2.8	0.2	0.2	0.7	1.6	-0.6	0.3
100	2.9	2.8	5.3	1.3	0.6	0.8	0.9	1.7	-0.3	0.4
150	-7.8	0.6	9.2	10.4	4.6	2.5	0.9	1.3	-0.1	0.5
200	-12.4	-0.3	9.3	13.4	7.6	3.4	0.4	0.5	-0.3	0.4
250	-10.0	0.8	7.6	11.1	8.5	3.1	-0.7	-0.8	-0.9	0.1
300	-7.0	2.0	5.9	8.0	8.1	2.5	-1.9	-2.0	-1.5	-0.2
400	-2.3	3.2	4.1	4.9	6.9	1.8	-2.4	-2.5	-1.7	-0.5
500	-0.3	3.1	3.2	4.5	6.0	1.6	-1.9	-2.1	-1.4	-0.5
700	-1.7	0.9	1.1	2.9	3.8	1.9	-0.6	-1.2	-0.7	-0.3
850	-8.5	-3.3	0.1	2.1	3.1	2.0	0.0	-0.8	-0.3	-0.0
1000	-17.8	-10.9	-1.5	2.3	3.2	2.1	0.3	-0.8	0.2	0.4

TABLE 12g NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE STANDING EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JULY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	67.9	2.9	-3.8	-0.3	4.5	-2.8	2.3	-1.3	1.4	0.7
1	61.5	1.8	-3.8	-0.8	4.6	-2.5	3.1	-1.1	1.7	0.7
2	54.3	0.1	-3.7	-1.1	4.4	-2.6	3.9	-0.9	2.0	0.9
5	43.5	-1.2	-5.0	-2.4	4.1	-2.8	5.0	-0.6	2.8	1.2
10	38.4	-0.6	-2.9	-2.5	4.5	-1.3	1.6	0.1	1.7	0.6
30	28.8	-0.3	-0.6	-4.0	4.3	1.8	-1.4	0.7	-1.0	-0.6
50	21.4	0.7	-1.1	-3.6	3.1	1.7	-1.1	0.8	-1.4	-0.8
70	18.3	1.6	-0.6	-1.1	2.4	1.5	-0.8	0.7	-1.5	-0.9
100	11.0	3.0	1.7	3.4	3.5	1.8	-0.8	0.2	-1.5	-0.9
150	1.9	2.6	5.1	8.6	6.7	3.1	-1.7	-1.0	-1.6	-0.9
200	0.8	1.3	4.7	9.5	8.6	3.6	-3.6	-2.8	-1.4	-0.7
250	2.5	1.5	3.7	7.4	8.6	2.8	-5.1	-4.4	-0.6	-0.2
300	3.3	1.9	2.9	4.8	7.5	2.0	-5.3	-4.6	0.1	0.1
400	2.9	1.8	1.6	2.1	5.7	1.4	-3.8	-3.1	0.4	0.2
500	1.9	0.9	1.0	2.0	5.0	1.2	-2.5	-1.8	0.2	-0.0
700	-2.0	-1.5	0.7	1.9	3.8	1.1	-0.7	-0.2	-0.1	-0.3
850	-8.8	-5.3	0.8	1.6	3.5	1.5	0.1	0.3	-0.2	-0.2
1000	-19.8	-12.9	-1.0	1.4	3.9	2.4	0.5	0.3	-0.3	-0.1

TABLE 12h NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE STANDING EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE AUGUST

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	76.4	6.2	-8.3	3.3	3.7	-4.7	1.7	0.7	4.0	1.6
1	74.5	7.1	-8.1	3.0	4.2	-4.5	2.2	0.9	3.4	1.3
2	72.8	8.2	-7.8	2.9	4.6	-4.3	2.8	1.0	3.0	1.1
5	71.0	7.8	-8.8	2.0	4.7	-3.8	3.5	1.3	2.9	0.9
10	65.9	9.0	-6.3	0.0	3.8	-2.5	0.8	0.8	2.2	0.9
30	41.0	7.8	-2.7	-3.9	2.8	0.4	-1.3	0.3	0.3	0.6
50	23.2	3.6	-2.2	-4.6	2.6	0.8	-0.8	0.6	-0.3	0.5
70	17.2	2.0	-1.5	-3.6	2.9	0.7	-0.4	0.7	-0.6	0.5
100	13.0	2.1	-0.0	0.5	5.3	0.8	-0.1	0.1	-1.0	0.4
150	5.5	2.3	2.1	6.5	9.2	1.7	0.5	-1.8	-2.4	0.0
200	0.7	2.2	2.1	7.6	9.8	2.0	1.3	-3.7	-4.0	-0.5
250	-0.4	2.4	1.5	5.6	8.0	1.8	1.9	-4.8	-5.5	-1.0
300	-0.5	2.4	0.9	3.4	6.0	1.6	2.0	-4.7	-6.2	-1.4
400	-0.3	1.5	0.0	1.1	3.9	1.7	1.4	-3.2	-5.7	-1.6
500	-0.1	0.8	-0.3	0.9	3.5	1.7	1.0	-1.8	-4.4	-1.4
700	-3.1	-0.6	0.1	0.6	3.0	1.9	0.6	-0.1	-2.2	-0.8
850	-8.0	-3.0	0.4	-0.0	2.4	2.0	0.5	0.3	-1.1	-0.5
1000	-12.0	-8.3	-1.5	-0.5	2.2	2.1	0.4	0.2	-0.6	-0.4

TABLE 12i NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE STANDING EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE SEPTEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	71.0	9.2	-19.7	2.5	4.2	-4.5	8.6	10.3	14.5	6.2
1	62.6	8.9	-19.6	2.3	5.1	-4.2	5.0	6.7	11.5	5.0
2	56.6	6.9	-20.3	1.9	5.3	-4.5	4.5	4.5	9.3	4.2
5	48.2	8.8	-20.0	1.5	4.8	-5.5	5.2	3.5	7.6	3.8
10	42.0	10.2	-15.5	0.6	2.6	-4.0	3.8	2.0	5.6	3.3
30	26.4	8.3	-8.3	-1.5	0.6	-1.3	1.2	-0.1	1.5	1.7
50	15.7	4.0	-5.8	-1.5	0.3	-1.3	0.4	0.3	0.3	1.1
70	10.4	0.7	-2.6	-0.4	-0.2	-1.2	0.1	0.5	-0.0	0.8
100	6.0	0.2	0.4	3.6	0.0	-0.1	0.1	0.6	-0.3	0.6
150	2.0	0.2	2.4	11.2	3.1	3.6	0.4	0.1	-0.4	0.3
200	-0.5	-0.5	2.5	13.2	5.5	6.4	0.4	-0.8	-0.2	0.3
250	0.7	0.3	2.1	10.7	5.8	6.7	-0.2	-1.7	0.2	0.5
300	2.4	1.0	1.7	7.4	5.1	5.8	-0.8	-1.9	0.2	0.4
400	3.5	1.0	1.0	3.7	3.7	3.8	-0.8	-1.7	-0.2	0.1
500	3.0	0.7	1.0	2.8	3.1	2.5	-0.1	-1.2	-0.3	-0.1
700	0.2	-0.3	0.6	1.5	2.0	1.9	0.9	-0.1	-0.2	-0.1
850	-1.8	-1.3	-0.5	0.2	1.2	1.9	1.5	0.7	-0.0	0.0
1000	-4.8	-4.2	-1.6	-1.6	1.3	1.5	1.9	1.3	0.2	0.3

TABLE 12j NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE STANDING EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE OCTOBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	30.1	-3.6	-19.8	20.7	29.3	69.9	79.8	62.4	39.7	18.8
1	31.0	-2.4	-21.0	15.2	23.7	52.4	60.0	40.7	24.1	10.0
2	33.3	-1.7	-22.0	9.3	16.6	36.2	43.9	25.8	14.6	5.6
5	36.0	2.4	-22.8	2.6	5.7	15.1	26.5	12.1	7.7	0.9
10	39.3	5.2	-19.1	-0.2	1.3	7.3	15.5	4.3	3.4	-0.4
30	36.6	8.5	-7.4	-0.0	2.0	3.1	4.7	-0.9	-0.9	-1.0
50	28.9	6.8	-3.4	1.4	3.2	2.1	2.0	-1.5	-1.5	-1.1
70	23.0	4.4	-0.0	3.9	5.3	2.7	0.9	-2.0	-1.6	-1.0
100	13.8	2.2	4.9	10.1	10.3	4.6	-0.1	-2.7	-1.4	-0.9
150	4.2	-0.3	9.6	18.6	16.9	7.5	-1.7	-4.0	-0.8	-0.3
200	-1.9	-1.7	9.9	19.8	17.7	7.9	-4.0	-5.2	-0.2	0.5
250	-1.5	-0.9	7.8	16.6	15.1	6.3	-6.5	-6.0	0.3	1.0
300	0.2	0.2	5.5	12.7	11.8	4.4	-8.0	-5.9	0.5	1.1
400	2.0	1.0	2.4	7.5	6.9	1.9	-7.8	-4.4	0.4	0.8
500	2.0	0.7	1.0	5.1	4.4	0.9	-6.0	-2.6	0.3	0.6
700	-0.7	0.4	0.1	2.1	2.0	0.5	-2.1	-0.6	0.7	0.7
850	-1.1	0.8	-0.1	0.6	0.8	0.4	0.0	0.7	0.7	0.7
1000	0.6	-0.2	-0.4	-0.5	0.1	-0.0	2.3	2.4	1.0	0.8

TABLE 12k NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE STANDING EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE NOVEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	33.5	-23.6	-21.0	55.5	88.0	134.6	157.1	66.7	-24.2	-22.1
1	37.8	-15.6	-21.7	44.3	71.6	114.5	155.2	74.0	-4.9	-13.4
2	44.9	-6.6	-23.4	33.5	62.1	105.1	158.4	79.4	12.7	-5.4
5	45.5	2.8	-26.0	10.9	39.2	72.6	127.6	59.8	19.0	-0.5
10	48.2	7.4	-21.1	0.4	19.9	37.5	76.0	26.2	10.6	-0.6
30	48.2	11.9	-9.5	0.5	6.1	3.7	12.0	-9.3	-3.3	-1.4
50	41.0	10.2	-4.8	3.6	6.1	0.7	0.9	-11.3	-4.3	-0.9
70	34.8	8.6	-0.0	7.1	8.3	1.4	-1.9	-9.0	-3.7	-0.5
100	15.3	5.1	6.8	14.8	13.7	4.0	-2.4	-7.8	-3.0	-0.2
150	-6.1	-0.8	12.8	24.7	22.4	8.6	-1.8	-6.6	-2.1	0.1
200	-10.4	-3.4	13.8	28.7	26.2	10.7	-2.3	-6.7	-1.6	0.4
250	-7.8	-2.8	12.1	23.8	24.8	10.0	-3.9	-7.4	-1.0	0.6
300	-4.9	-1.3	9.6	19.6	20.8	8.1	-5.5	-7.8	-0.5	0.6
400	-1.0	-0.1	5.3	12.6	12.7	4.4	-6.8	-6.7	-0.2	0.4
500	0.5	-0.0	2.9	8.3	7.2	2.2	-5.7	-4.7	-0.3	0.0
700	-2.5	-0.7	1.0	3.3	1.7	0.5	-2.6	-1.7	-0.6	-0.3
850	-3.5	-0.3	0.6	0.8	-0.1	-0.1	0.1	0.4	-0.9	-0.2
1000	-1.9	0.1	0.2	0.0	-0.8	-0.9	5.0	2.5	-0.3	0.0

TABLE 12l NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE STANDING EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1981) AVERAGE DECEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	249.6	20.2	-34.0	40.4	83.5	115.0	83.0	28.7	20.4	3.6
1	159.8	6.5	-32.3	31.3	64.9	98.5	103.0	37.2	23.2	3.4
2	76.1	-6.3	-28.7	27.2	61.3	104.1	136.3	52.0	27.2	2.9
5	20.7	-11.8	-25.6	18.1	53.8	103.9	155.7	59.1	30.5	3.1
10	19.7	-8.3	-20.4	8.4	36.5	77.3	121.9	40.6	27.0	3.5
30	16.2	1.9	-7.8	3.0	11.1	13.6	36.4	3.6	10.4	2.0
50	5.9	5.2	-2.5	4.9	7.7	4.9	10.3	-4.9	3.3	0.8
70	-3.2	5.6	1.7	8.5	8.8	1.0	0.2	-7.9	0.8	0.3
100	-10.3	5.2	6.9	15.8	12.7	0.0	-6.2	-9.3	-0.9	-0.2
150	-15.6	0.6	12.0	23.9	18.8	0.6	-10.8	-9.8	-2.1	-0.9
200	-19.2	-3.0	13.1	24.5	20.8	0.8	-14.0	-10.5	-2.1	-1.0
250	-19.4	-3.4	11.6	21.4	18.5	0.2	-16.2	-11.1	-1.8	-0.6
300	-17.5	-2.4	9.3	17.8	14.4	-0.3	-16.6	-10.8	-1.5	-0.0
400	-11.0	-0.3	5.6	11.8	7.9	0.0	-13.2	-8.5	-1.5	0.2
500	-5.8	0.8	3.8	7.7	4.5	0.8	-8.8	-5.9	-1.3	-0.1
700	-3.4	-0.5	1.4	3.3	2.0	1.7	-2.5	-2.5	-0.4	-0.3
850	-3.5	-0.4	1.1	1.0	1.0	2.0	0.4	-0.1	0.1	-0.1
1000	-4.3	2.4	1.1	-0.1	0.4	2.0	3.4	2.7	1.2	0.6

TABLE 13a NORTHWARD FLUX OF EASTWARD MOMENTUM (m^2/s^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE JANUARY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)										
	5	10	20	30	40	50	60	70	80	85	
0.4	14.6	-14.5	-9.0	40.1	139.2	268.8	176.6	156.9	52.5	17.8	
1	9.9	-12.4	-6.3	32.9	108.7	226.5	188.9	175.2	59.8	14.8	
2	5.8	-10.1	-3.9	26.9	84.4	194.2	209.0	199.8	69.1	12.4	
5	-0.4	-5.0	-1.5	15.6	50.0	134.9	194.0	184.1	54.7	1.6	
10	-1.8	-3.6	-0.4	6.6	25.5	79.2	132.3	127.6	27.9	-7.7	
30	-1.0	-2.0	-0.1	-0.1	2.6	11.0	27.5	29.2	-2.8	-12.4	
50	-1.2	-1.4	0.6	0.2	-0.4	-3.0	3.5	5.2	-8.1	-11.1	
70	-1.3	-0.8	1.6	1.9	-0.1	-6.1	-4.0	-2.3	-8.4	-9.3	
100	-3.8	-0.9	3.3	5.3	1.6	-6.1	-6.9	-5.9	-7.7	-7.2	
150	-6.6	-0.9	5.8	8.9	4.6	-3.6	-6.7	-7.0	-6.0	-5.0	
200	-5.4	0.0	6.2	9.1	6.4	-1.3	-5.9	-8.9	-4.5	-3.7	
250	-3.3	0.0	5.1	7.7	6.6	0.2	-5.2	-6.3	-3.5	-3.0	
300	-1.0	1.1	3.7	6.1	5.7	0.8	-4.6	-5.6	-2.6	-2.3	
400	1.4	0.9	1.5	3.6	3.7	1.1	-3.3	-4.1	-1.1	0.0	
500	1.6	0.5	0.5	2.2	2.3	1.1	-2.2	-2.7	0.1	0.0	
700	0.1	-0.1	0.0	0.9	1.2	1.1	-0.5	-0.8	1.3	0.9	
850	-0.5	-0.3	0.1	0.5	1.0	1.1	0.8	0.6	2.3	1.6	
1000	-0.4	-0.4	0.2	0.2	1.2	1.2	2.0	2.4	3.7	2.6	

TABLE 13c NORTHWARD FLUX OF EASTWARD MOMENTUM (m^2/s^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE MARCH

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)										
	5	10	20	30	40	50	60	70	80	85	
0.4	3.8	3.0	7.8	22.1	46.1	71.4	31.7	5.5	-40.9	-31.7	
1	2.9	-0.1	3.7	15.9	35.1	56.3	28.7	13.7	-13.4	-13.1	
2	2.9	-2.0	1.1	10.7	26.1	46.4	29.4	19.9	9.4	1.0	
5	-0.5	-3.5	-1.2	3.7	9.9	27.3	23.9	20.9	22.6	7.0	
10	-1.4	-3.4	-1.1	0.9	3.3	15.5	15.5	16.1	14.1	2.4	
30	-0.4	-2.3	-0.4	0.2	0.8	2.8	0.9	-0.5	-5.0	-5.0	
50	-0.5	-1.8	-0.2	-0.0	0.5	-1.5	-3.9	-5.7	-6.4	-4.5	
70	-0.4	-1.2	0.7	0.3	0.7	-2.9	-5.2	-6.3	-5.6	-3.1	
100	0.0	-0.3	2.1	1.3	1.2	-3.2	-4.9	-5.2	-4.3	-1.7	
150	1.2	0.4	3.5	2.7	2.2	-2.5	-3.2	-2.8	-2.9	-0.5	
200	2.0	0.8	3.7	2.9	2.3	-1.5	-1.7	-1.0	-2.0	0.3	
250	2.4	0.9	3.2	2.3	1.8	-0.7	-0.6	-0.0	-1.8	0.7	
300	2.6	0.9	2.4	1.7	1.3	-0.2	-0.4	0.4	-1.8	0.8	
400	2.3	0.7	1.2	1.1	0.9	0.3	-0.1	0.5	-1.7	0.6	
500	1.9	0.4	0.6	0.8	0.9	0.5	0.1	0.6	-1.5	0.4	
700	0.4	0.1	0.1	0.5	0.6	0.7	0.5	0.8	-1.3	-0.1	
850	-0.9	-0.4	-0.1	0.2	0.3	0.5	1.0	0.7	-1.5	-0.6	
1000	-3.1	-1.2	-0.3	-0.0	0.1	0.2	1.8	0.6	-1.6	-0.4	

TABLE 13e NORTHWARD FLUX OF EASTWARD MOMENTUM (m^2/s^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE MAY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)										
	5	10	20	30	40	50	60	70	80	85	
0.4	6.4	-0.6	0.2	5.2	0.9	1.2	-1.7	-1.1	-1.4	0.8	
1	3.2	-2.3	-0.2	4.6	0.8	0.9	-0.8	-0.3	-0.6	0.9	
2	2.1	-2.6	-0.3	4.1	0.8	0.7	0.0	0.4	0.3	1.0	
5	-0.3	-2.5	-0.4	3.2	0.5	0.4	1.1	0.9	0.9	1.1	
10	-0.6	-1.6	-0.2	2.3	0.4	0.2	0.7	0.4	0.9	1.0	
30	0.4	-0.4	-0.1	1.1	-0.3	-0.2	-0.1	-0.1	0.1	0.1	
50	0.1	-0.5	-0.1	0.5	-1.0	-0.4	-0.2	-0.2	-0.1	-0.3	
70	-0.2	-0.8	0.5	0.5	-1.9	-0.8	-0.4	-0.4	-0.3	-0.5	
100	-1.1	-1.5	2.2	1.6	-2.8	-1.0	-0.6	-0.6	-0.4	-0.7	
150	-1.6	-1.8	4.1	3.8	-3.0	-0.5	-0.8	-1.0	-0.5	-0.8	
200	-1.2	-1.4	3.9	3.5	-2.7	0.2	-1.0	-1.4	-0.6	-0.9	
250	-0.6	-0.9	2.9	2.2	-2.4	0.5	-1.3	-1.6	-0.7	-0.9	
300	-0.2	-0.5	2.1	1.2	-2.0	0.4	-1.4	-1.6	-0.8	-0.9	
400	-0.0	-0.2	1.2	0.3	-1.2	0.3	-1.4	-1.4	-0.9	-0.6	
500	-0.1	0.0	0.7	0.1	-0.6	0.1	-1.3	-1.0	-1.0	-0.5	
700	-0.8	-0.0	-0.0	0.0	0.2	0.2	-0.9	-0.6	-0.9	-0.3	
850	-2.6	-1.1	-0.4	0.3	0.5	0.3	-0.7	-0.5	-0.9	-0.2	
1000	-7.0	-4.1	-0.3	0.6	0.8	0.4	-0.5	-0.8	-0.5	-0.1	

TABLE 13b NORTHWARD FLUX OF EASTWARD MOMENTUM (m^2/s^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE FEBRUARY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)										
	5	10	20	30	40	50	60	70	80	85	
0.4	24.1	-4.0	-1.5	13.4	33.6	65.5	78.2	78.2	26.3	3.5	
1	13.7	-5.0	-1.5	9.1	22.4	51.5	73.9	83.7	43.2	5.7	
2	5.7	-4.7	-1.5	5.3	12.9	39.0	69.4	87.9	56.9	6.3	
5	-1.6	-4.0	-1.5	0.9	3.1	22.7	60.3	84.4	62.9	4.3	
10	-1.6	-3.0	-1.1	0.2	1.2	14.1	40.9	61.5	52.5	2.3	
30	-0.6	-1.6	-0.3	0.4	0.4	1.5	7.1	14.3	21.9	-1.7	
50	-1.0	-1.4	0.4	0.8	0.3	-2.4	0.9	2.6	10.4	-2.9	
70	-1.0	-1.1	1.1	2.0	1.0	-3.1	-0.5	-0.3	6.0	-2.8	
100	-2.3	-0.8	2.2	4.6	2.9	-2.3	-0.4	-0.7	3.1	-2.1	
150	-4.1	-0.9	3.7	7.9	6.0	-0.1	0.4	0.1	1.4	-1.1	
200	-3.0	-0.3	4.2	8.8	7.8	1.8	0.9	0.5	0.6	-0.7	
250	-1.4	0.3	3.8	8.0	7.8	2.9	1.2	0.7	0.1	-0.5	
300	-0.0	0.7	3.0	6.7	6.9	3.3	1.3	0.8	-0.1	-0.4	
400	1.1	0.8	1.5	4.4	5.1	3.1	1.3	0.9	-0.2	-0.4	
500	1.1	0.5	0.6	2.8	3.8	2.7	1.3	1.0	-0.1	-0.5	
700	-0.2	-0.1	0.1	1.3	2.3	2.1	1.4	1.3	0.2	-0.4	
850	-0.8	-0.3	0.1	0.8	1.5	1.7	2.0	1.5	0.7	-0.0	
1000	-1.6	-0.5	0.1	0.4	1.3	1.6	3.3	2.3	2.3	1.2	

TABLE 13d NORTHWARD FLUX OF EASTWARD MOMENTUM (m^2/s^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE APRIL

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)										
	5	10	20	30	40	50	60	70	80	85	
0.4	-16.7	-6.4	-1.3	-0.3	-1.4	9.0	3.7	-10.8	13.7	32.9	
1	-12.4	-5.3	-0.9	0.0	-0.5	6.5	1.4	-10.5	4.9	19.3	
2	-7.7	-3.9	-0.7	-0.2	0.3	5.4	2.1	-7.6	-2.2	8.1	
5	-3.0	-2.8	-1.2	-0.9	0.5	4.6	6.2	-0.2	-3.9	1.6	
10	-2.1	-2.7	-1.0	-0.6	0.8	3.6	6.1	2.6	-3.2	0.2	
30	-1.9	-2.1	0.0	0.7	-0.0	0.2	0.3	-1.0	-4.5	-2.3	
50	-2.2	-2.2	0.4	1.2	-0.5	-0.9	-1.7	-2.2	-3.9	-2.1	
70	-2.6	-2.6	1.2	2.0	-1.1	-1.4	-2.2	-2.3	-2.9	-1.4	
100	-1.7	-2.3	2.1	3.2	-1.5	-1.5	-2.1	-2.0	-2.3	-0.9	
150	0.2	-1.3	2.9	4.8	-1.2	-1.1	-1.2	-1.2	-1.7	-0.5	
200	0.5	-0.7	2.9	4.7	-1.1	-1.0	-0.1	-1.0	-1.3	-0.3	
250	0.6	-0.3	2.4	3.6	-1.3	-1.0	0.8	1.0	-1.4	-0.3	
300	0.7	-0.1	1.9	2.5	-1.4	-1.1	1.3	1.6	-1.7	-0.5	
400	0.7	0.0	1.2	1.2	-1.1	-1.0	1.3	1.5	-1.6	-0.4	
500	0.5	0.0	0.7	0.6	-0.7	-0.8	1.0	1.0	-0.9	-0.0	
700	-0.3	-0.1	0.1	0.0	-0.1	-0.2	0.6	0.6	-0.1	0.1	
850	-1.3	-0.7	-0.2	-0.1	0.1	0.2	0.4	0.5	-0.2	-0.1	
1000	-3.9	-2.2	-0.3	-0.3	0.3	0.4	0.2	0.4	-0.0	0.0	

TABLE 13f NORTHWARD FLUX OF EASTWARD MOMENTUM (m^2/s^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE JUNE

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)										
	5	10	20	30	40	50	60	70	80	85	
0.4	10.6	-7.7	-0.8	4.2	1.4	1.5	-0.9	-0.6	-1.7	0.2	
1	7.6	-6.3	-1.3	4.0	0.9	1.2	-0.1	-0.1	-1.4	0.3	
2	4.6	-4.6	-1.9	3.7	0.4	0.8	0.8	0.2	-1.1	0.4	
5	1.4	-2.3	-2.4	3.3	-0.2	0.5	1.9	0.7	-0.7	0.6	
10	1.2	-1.0	-1.7	2.7	-0.1	0.3	1.1	0.5	-0.5	0.7	
30	1.8	-0.3	-0.2	1.2	-0.4	0.1	0.1	0.4	-0.9	0.3	
50	1.4	-0.5	0.2	0.7	-1.0	-0.0	0.5	0.7	-0.9	0.2	
70	1.1	-1.2	0.8	1.2	-1.7	-0.1	0.8	1.0	-0.7	0.3	
100	-2.1	-2.9	1.6	2.7	-2.4	0.1	1.3	1.2	-0.4	0.4	
150	-8.2	-4.4	2.3	4.2	-2.1	1.3	1.8	1.4	-0.1	0.5	
200	-5.3	-3.4	2.3	3.7	-1.3	2.6	2.2	1.5	-0.0	0.4	
250	-2.9	-1.9	1.9	2.3	-0.7	3.0	2.5	1.5	-0.3	0.1	
300	-0.9	-0.8	1.4	1.3	-0.3	2.9	2.5	1.9	-0.6	-0.3	
400	0.4	0.2	0.9	0.4	0.2	2.0	1.9	0.8	-0.9	-0.6	
500	-0.0	0.2	0.5	0.2	0.4	1.4	1.3	0.5	-0.8	-0.6	
700	-2.9	-0.9	-0.4	0.2	0.6	0.7	0.5	0.1	-0.5	-0.4	
850	-6.7	-2.8	-0.8	0.3	0.6	0.5	0.1	-0.1	-0.2	-0.1	
1000	-11.9	-6.5	-1.0	0.7	0.7	0.5	0.0	-0.5	0.2	0.3	

TABLE 13g NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE JULY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	19.6	-4.1	2.9	3.3	1.9	0.8	-1.1	-1.3	-0.2	0.1
1	14.2	-3.0	1.6	2.9	1.5	0.8	-0.2	-0.9	-0.0	0.2
2	8.9	-2.4	0.4	2.6	0.9	0.8	0.8	-0.6	0.3	0.3
5	3.2	-1.5	-0.7	2.2	0.0	0.5	2.1	-0.3	0.9	0.5
10	1.9	-0.7	-0.7	1.9	0.1	0.3	1.0	0.0	0.2	0.1
30	1.8	-0.4	-0.1	1.4	0.5	0.3	-0.2	0.6	-1.2	-0.6
50	1.6	-0.6	-0.0	1.2	0.5	0.4	-0.0	0.7	-1.4	-0.7
70	1.4	-1.1	0.2	1.9	0.6	0.4	0.2	0.6	-1.4	-0.8
100	-1.5	-2.5	-0.0	3.3	0.8	0.6	0.2	0.4	-1.6	-0.8
150	-5.8	-4.0	-0.6	3.6	0.8	0.9	0.0	-0.2	-1.8	-0.8
200	-4.9	-3.1	-0.3	3.0	0.5	0.9	-0.2	-0.9	-1.8	-0.6
250	-2.5	-1.5	0.2	2.1	0.2	0.8	-0.0	-1.7	-1.6	-0.3
300	-0.7	-0.4	0.6	1.3	-0.0	0.7	0.2	-1.9	-1.3	0.0
400	0.1	0.3	0.7	0.5	-0.1	0.6	0.4	-1.4	-1.1	0.0
500	-0.5	0.1	0.3	0.3	-0.0	0.5	0.4	-0.9	-1.0	-0.2
700	-3.7	-1.3	-0.5	0.3	0.3	0.4	0.2	-0.3	-0.7	-0.3
850	-7.3	-3.4	-0.9	0.5	0.5	0.4	0.1	-0.2	-0.3	-0.2
1000	-11.8	-6.8	-1.4	1.0	0.6	0.4	0.2	-0.0	0.1	0.0

TABLE 13h NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE AUGUST

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	12.7	-4.3	-0.0	2.0	-0.1	0.2	-1.6	-0.4	1.0	0.7
1	9.5	-3.0	-0.4	1.6	-0.1	0.3	-0.6	-0.1	0.9	0.5
2	6.3	-2.1	-0.6	1.4	-0.1	0.3	0.5	0.2	0.9	0.4
5	0.2	-1.2	-0.7	1.0	-0.3	0.3	1.8	0.6	1.2	0.3
10	-1.1	-0.5	-0.6	1.1	-0.0	0.3	1.0	0.3	1.2	0.4
30	-1.0	-0.4	-0.2	1.0	0.5	0.4	-0.3	0.1	0.4	0.5
50	-1.5	-0.8	-0.1	0.9	0.7	0.3	-0.2	0.2	0.0	0.5
70	-1.8	-1.3	-0.1	1.6	1.2	0.3	-0.1	0.1	-0.1	0.5
100	-3.4	-2.5	-0.5	3.3	2.5	0.3	0.1	-0.4	-0.4	0.5
150	-5.4	-3.2	-0.9	4.0	3.1	0.2	0.3	-1.4	-1.5	0.1
200	-4.4	-2.3	-0.4	3.0	2.1	0.1	0.7	-2.6	-2.8	-0.3
250	-2.4	-1.1	0.2	1.9	0.9	0.0	1.2	-3.3	-4.0	-0.7
300	-0.9	-0.2	0.6	1.1	0.3	0.1	1.4	-3.3	-4.6	-1.0
400	-0.2	0.3	0.8	0.4	-0.1	0.2	1.4	-2.3	-4.4	-1.3
500	-0.9	0.1	0.6	0.2	-0.0	0.3	1.2	-1.5	-3.5	-1.2
700	-3.2	-1.0	-0.1	0.0	0.2	0.3	0.7	-0.6	-1.9	-0.7
850	-5.2	-2.3	-0.5	0.1	0.3	0.3	0.3	-0.1	-1.0	-0.4
1000	-7.7	-4.6	-1.0	0.4	0.4	0.3	0.1	0.2	-0.6	-0.5

TABLE 13i NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE SEPTEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	2.7	-3.3	-1.1	1.4	0.1	1.1	3.7	6.3	9.4	5.1
1	2.2	-3.0	-1.3	1.1	0.3	1.4	2.5	3.5	6.8	4.1
2	1.6	-2.9	-1.6	0.5	0.3	1.2	1.6	1.8	4.9	3.3
5	-0.9	-2.0	-1.8	-0.2	-0.3	0.1	1.2	1.0	3.7	2.9
10	-1.4	-1.2	-1.2	0.0	-0.5	-0.1	0.5	0.8	3.0	2.5
30	-0.9	-0.6	-0.1	0.3	-0.3	0.0	0.0	0.3	1.3	1.5
50	-1.1	-0.7	0.1	0.2	-0.2	0.1	0.3	0.4	0.6	1.0
70	-1.7	-1.3	0.4	0.6	-0.2	0.2	0.6	0.6	0.5	0.8
100	-3.5	-2.5	0.4	1.7	0.1	0.9	1.0	0.9	0.4	0.6
150	-5.2	-3.3	0.3	3.1	0.7	2.5	1.7	1.2	0.3	0.4
200	-4.3	-2.8	0.4	2.9	1.1	3.8	2.2	1.1	0.4	0.4
250	-2.6	-1.7	0.4	2.0	0.9	4.2	2.6	0.7	0.5	0.5
300	-1.2	-0.8	0.4	1.1	0.6	3.9	2.6	0.5	0.4	0.4
400	-0.0	0.0	0.4	0.2	0.1	2.9	2.2	0.4	-0.1	0.0
500	-0.2	0.1	0.4	-0.1	0.0	2.0	1.8	0.4	-0.3	-0.1
700	-2.1	-0.5	0.0	-0.0	0.3	1.1	1.3	0.5	-0.3	-0.2
850	-3.7	-1.3	-0.4	0.1	0.4	0.8	0.9	0.6	-0.1	-0.0
1000	-5.3	-2.8	-0.8	0.2	0.4	0.5	0.7	0.7	0.3	0.3

TABLE 13j NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE OCTOBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-10.1	-2.4	1.6	20.5	28.3	70.4	69.5	57.4	31.9	15.5
1	-8.7	-2.3	0.7	14.8	21.0	51.3	49.5	37.1	17.2	8.6
2	-4.9	-1.9	-0.1	9.2	13.6	33.4	33.2	23.3	7.2	3.4
5	-1.1	-1.0	-0.8	2.7	3.5	11.9	14.9	10.8	0.3	0.7
10	0.1	-0.3	-0.8	0.3	0.4	3.9	6.3	4.8	-1.5	1.6
30	0.7	0.2	-0.4	-0.5	0.3	0.6	1.1	0.1	-1.1	-1.2
50	0.4	0.1	0.0	-0.3	0.7	0.4	0.7	-0.4	-0.8	-1.0
70	0.0	-0.4	0.7	0.4	1.4	0.8	0.5	-0.5	-0.9	-0.9
100	-0.8	-1.0	2.0	2.5	2.8	1.8	0.6	-0.6	-0.8	-0.8
150	-1.5	-1.4	2.7	4.8	4.1	2.8	0.7	-0.7	-0.0	0.1
200	-1.8	-1.3	2.3	4.3	3.6	2.9	0.5	-0.7	0.6	0.5
250	-1.5	-0.9	1.6	2.8	2.5	2.4	0.2	-0.7	1.5	1.0
300	-1.0	-0.6	1.0	1.6	1.5	1.8	-0.2	-0.6	1.7	1.1
400	-0.3	-0.1	0.4	0.4	0.4	1.0	-0.6	-0.3	1.4	0.8
500	-0.1	0.0	0.1	0.0	-0.0	0.6	-0.6	-0.1	1.0	0.6
700	-1.2	-0.2	0.0	0.0	-0.0	0.4	-0.3	-0.1	0.9	0.7
850	-2.0	-0.5	-0.1	0.1	0.0	0.4	0.1	0.0	1.0	0.8
1000	-2.3	-1.3	-0.5	-0.0	-0.0	0.4	0.8	0.6	1.3	0.9

TABLE 13k NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE NOVEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-8.7	-24.0	-0.2	51.1	79.0	128.7	139.7	60.8	-37.5	-24.3
1	-6.0	-18.6	0.4	42.1	64.9	111.7	137.0	67.3	-17.9	-15.8
2	-1.8	-13.1	0.4	32.5	56.4	102.2	137.4	72.2	0.4	-7.5
5	-0.9	-5.8	-1.2	14.2	34.4	69.0	105.9	54.8	9.1	-2.2
10	-0.7	-2.5	-1.1	3.8	16.2	35.0	57.8	23.0	4.8	-1.6
30	0.6	-0.7	-0.4	-0.4	2.9	2.6	3.3	-10.3	-2.5	-1.4
50	0.4	-0.8	0.3	0.3	2.0	-1.3	-4.1	-11.0	-2.5	-0.7
70	0.3	-1.0	1.3	1.4	2.8	-1.5	-5.3	-8.7	-1.8	-0.2
100	-1.3	-1.6	3.1	3.9	4.7	-0.3	-4.6	-5.6	-1.2	0.0
150	-4.0	-2.3	4.6	6.8	7.5	1.9	-2.5	-2.3	-0.4	0.3
200	-4.4	-2.2	4.3	6.7	8.4	3.4	-1.3	-0.1	-0.0	0.4
250	-3.4	-1.7	3.4	5.3	7.6	3.8	-0.8	1.3	0.2	0.4
300	-1.8	-0.9	2.5	3.8	6.1	3.6	-0.6	1.9	0.4	0.4
400	-0.3	-0.2	1.2	1.8	3.3	2.6	-0.6	1.7	0.3	0.2
500	-0.2	-0.0	0.5	0.8	1.4	1.7	-0.5	1.1	0.1	-0.1
700	-1.6	-0.3	-0.1	0.2	0.0	0.9	-0.2	0.4	-0.4	-0.3
850	-2.1	-0.5	-0.2	0.0	-0.2	0.4	0.5	0.5	-0.6	-0.2
1000	-1.9	-1.0	-0.3	-0.1	-0.3	0.0	2.2	1.4	0.0	0.1

TABLE 13l NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE DECEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	39.9	-14.2	-8.9	17.0	31.3	42.9	34.0	19.0	3.4	-0.3
1	24.9	-14.2	-6.2	13.6	26.9	43.9	53.5	29.7	6.7	-0.6
2	10.4	-13.0	-2.8	13.7	31.6	56.6	81.2	45.9	10.7	1.3
5	-1.9	-7.5	0.2	10.4	33.0	63.9	100.4	57.3	14.6	-1.2
10	-2.4	-3.9*	0.2	4.8	23.4	47.7	79.6	44.5	14.2	-0.3
30	-0.4	-1.6	-0.1	0.3	6.4	12.1	27.2	12.8	5.7	0.0
50	-0.6	-1.1	0.5	0.5	3.3	3.8	12.7	4.4	1.4	-0.4
70	-0.7	-0.7	1.7	1.8	3.1	1.8	7.0	1.1	-0.2	-0.5
100	-2.8	-0.4	4.0	4.9	4.3	1.7	3.5	-0.7	-1.2	-0.8
150	-5.1	-0.4	6.1	6.4	6.3	3.1	1.3	-1.4	-1.6	-1.1
200	-4.6	-0.2	5.7	8.5	7.0	4.4	-0.1	-1.7	-1.3	-1.0
250	-3.6	-0.2	4.4	7.0	6.8	5.0	-1.3	-1.9	-0.6	-0.5
300	-2.0	0.0	3.2	5.4	6.0	4.8	-1.9	-1.9	0.1	0.2
400	0.1	0.3	1.5	3.1	4.1	3.7	-1.7	-1.4	0.3	0.4
500	0.5	0.4	0.6	1.8	2.6	2.8	-1.0	-1.0	0.0	0.0
700	-0.9	0.1	0.0	0.7	1.1	1.7	0.0	-0.6	-0.2	-0.3
850	-1.1	-0.3	0.0	0.4	0.7	1.1	0.8	0.0	0.1	-0.2
1000	-0.1	-0.4	0.1	0.2	0.5	0.8	2.2	1.5	1.3	0.6

TABLE 14a NORTHWARD FLUX OF EASTWARD MOMENTUM (m^2/s^2) BY THE STANDING EDDIES OF THE ZONAL WAVELENGTH 2 FOR 4-YEAR (1979-1982) AVERAGE JANUARY

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-11.3	-1.6	2.4	13.1	26.3	22.4	33.3	18.6	19.5	2.5
1	-5.6	-0.4	0.2	5.6	15.8	16.8	29.7	16.6	20.5	2.8
2	-0.4	0.8	-1.0	0.4	9.8	15.2	27.6	15.2	22.2	3.3
5	4.9	1.8	-1.2	-2.9	6.6	15.4	23.8	10.7	23.7	3.7
10	6.4	1.8	-0.5	-1.8	5.8	12.1	16.7	5.5	21.7	3.5
30	5.5	1.1	-0.0	0.3	3.1	-0.2	3.7	-0.8	11.9	1.7
50	4.2	0.3	0.1	0.9	1.8	-4.3	-3.5	-4.1	6.9	0.9
70	1.8	-0.8	0.2	1.6	1.2	-6.1	-8.1	-6.3	4.6	0.5
100	-1.9	-2.7	-0.0	2.2	0.4	-7.3	-11.3	-7.6	2.7	0.2
150	-4.9	-5.4	-0.5	1.8	-1.1	-8.3	-13.9	-8.0	1.6	0.1
200	-1.8	-6.1	-0.3	0.2	-3.3	-9.2	-15.8	-8.4	1.6	0.3
250	-4.0	-5.4	-0.1	-1.4	-5.6	-9.5	-16.9	-8.6	1.7	0.4
300	-2.4	-4.1	0.0	-2.1	-7.0	-9.5	-16.6	-8.2	1.5	0.5
400	-0.5	-2.1	-0.0	-1.8	-6.4	-7.7	-13.3	-6.2	0.8	0.4
500	0.2	-1.2	-0.1	-1.1	-4.5	-5.6	-9.3	-4.4	0.4	0.2
700	-0.1	-0.7	0.0	-0.5	-1.8	-2.6	-3.3	-1.7	0.5	0.2
850	-0.8	-0.4	0.1	-0.5	-0.9	-1.5	-0.7	-0.0	0.5	0.1
1000	-1.0	0.2	0.0	-0.6	-0.6	-1.6	1.9	1.3	0.4	0.1

TABLE 14b NORTHWARD FLUX OF EASTWARD MOMENTUM (m^2/s^2) BY THE STANDING EDDIES OF THE ZONAL WAVELENGTH 2 FOR 4-YEAR (1979-1982) AVERAGE FEBRUARY

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.8	2.7	-0.3	-0.8	3.8	3.6	7.7	12.7	2.0	0.1
1	-4.3	2.3	-0.8	-2.7	0.1	3.4	12.7	14.4	4.2	0.6
2	-4.5	2.9	-1.0	-4.2	-1.9	5.3	18.8	17.4	6.5	1.2
5	2.1	4.0	-1.0	-5.4	-1.4	8.8	23.5	20.9	8.8	1.7
10	5.1	3.9	-0.6	-3.9	1.0	9.8	18.1	16.8	11.6	2.2
30	3.4	2.3	-0.1	-1.0	3.6	4.4	6.3	7.0	10.8	1.9
50	2.0	1.0	-0.3	-0.2	3.7	0.1	1.2	3.5	6.0	1.0
70	0.4	-0.1	-0.2	0.7	3.5	-2.9	-3.2	1.0	3.3	0.5
100	-1.2	-1.4	-0.0	1.9	3.2	-5.3	-7.3	-1.6	1.3	0.1
150	-1.9	-3.1	0.1	2.7	2.7	-7.6	-10.7	-4.3	-0.4	-0.1
200	-2.1	-3.4	0.4	1.8	1.1	-10.0	-12.8	-6.0	-0.6	-0.1
250	-1.9	-3.1	0.6	0.2	-1.4	-12.1	-14.2	-7.3	-0.1	0.2
300	-1.1	-2.4	0.5	-0.8	-3.4	-12.7	-14.4	-7.7	0.6	0.4
400	-0.2	-1.5	0.4	-1.0	-4.0	-10.6	-12.5	-6.8	1.1	0.6
500	0.4	-1.1	0.2	-0.7	-2.8	-7.6	-9.8	-5.5	0.9	0.6
700	0.6	-0.8	0.3	-0.3	-1.3	-3.6	-5.0	-3.9	0.3	0.2
850	-0.4	-0.4	0.4	-0.4	-1.1	-2.4	-3.2	-2.3	0.0	0.1
1000	-1.6	0.3	0.2	-0.8	-1.1	-2.7	-1.9	-0.6	-0.1	0.0

TABLE 14c NORTHWARD FLUX OF EASTWARD MOMENTUM (m^2/s^2) BY THE STANDING EDDIES OF THE ZONAL WAVELENGTH 2 FOR 4-YEAR (1979-1982) AVERAGE MARCH

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	8.7	5.1	3.3	1.9	1.8	6.6	7.3	2.0	-4.0	-0.5
1	9.2	5.1	2.8	0.6	1.2	5.1	8.1	4.3	0.6	0.1
2	8.7	4.5	2.3	-0.2	1.2	5.6	11.0	6.8	3.9	0.6
5	8.6	3.7	1.3	-1.6	1.3	6.1	12.9	7.0	4.6	0.6
10	7.5	3.1	0.8	-1.7	1.0	5.3	10.2	4.6	4.0	0.4
30	5.6	1.9	0.5	-0.6	1.4	1.0	1.2	-0.4	2.2	0.1
50	4.0	1.3	0.7	0.3	1.9	-1.2	-3.1	-3.3	0.6	-0.1
70	2.3	0.9	1.2	1.7	2.7	-1.9	-5.4	-5.2	-0.4	-0.2
100	-0.9	-0.2	1.7	4.3	4.1	-1.8	-7.0	-6.6	-1.3	-0.3
150	-4.1	-2.1	1.9	7.5	6.3	-1.0	-7.9	-7.4	-1.9	-0.4
200	-4.1	-2.7	2.5	8.5	7.4	-0.7	-8.5	-7.9	-2.1	-0.5
250	-3.3	-2.5	2.7	7.6	7.3	-0.6	-9.4	-8.8	-1.9	-0.5
300	-2.5	-1.8	2.5	6.3	6.7	-0.3	-9.9	-9.5	-1.8	-0.4
400	-1.2	-0.7	1.9	4.1	5.4	0.6	-8.8	-8.5	-1.9	-0.3
500	-0.0	-0.1	1.3	2.7	4.6	1.3	-6.4	-6.1	-1.8	-0.3
700	0.5	0.0	0.7	1.3	3.0	1.9	-2.4	-2.4	-0.8	-0.1
850	0.1	0.1	0.6	0.9	1.7	1.9	-0.6	-0.3	-0.1	0.0
1000	-0.6	0.4	0.4	0.6	0.7	1.5	1.2	0.6	0.2	0.0

TABLE 14d NORTHWARD FLUX OF EASTWARD MOMENTUM (m^2/s^2) BY THE STANDING EDDIES OF THE ZONAL WAVELENGTH 2 FOR 4-YEAR (1979-1982) AVERAGE APRIL

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	12.3	6.4	1.6	-0.6	-2.1	-0.2	0.4	-6.6	10.6	5.7
1	12.6	6.7	2.2	-0.5	-2.7	0.2	1.6	-5.3	4.5	2.7
2	11.0	6.3	2.6	-0.5	-2.7	1.4	3.4	-3.8	1.1	0.8
5	7.2	4.8	2.5	-0.5	-2.1	3.7	5.4	-1.6	1.4	0.5
10	5.5	3.8	2.0	-0.0	-0.9	4.6	6.6	-0.9	1.9	0.6
30	3.7	2.0	0.9	0.6	0.1	1.5	2.1	-1.0	0.5	0.2
50	2.5	1.1	0.5	0.6	-0.0	-0.3	-0.1	-0.7	0.1	0.1
70	1.0	0.3	0.0	0.1	-0.2	-0.9	-1.2	-0.7	0.0	0.1
100	-1.6	-1.2	-0.7	-1.0	-0.5	-1.4	-1.9	-0.9	-0.2	0.1
150	-4.4	-3.4	-1.4	-1.7	-0.9	-1.9	-2.3	-1.1	-0.3	0.1
200	-4.0	-3.8	-1.3	-1.9	-1.4	-2.4	-2.6	-1.3	-0.3	0.1
250	-2.9	-3.3	-1.0	-1.6	-1.7	-2.6	-2.8	-1.8	-0.3	0.1
300	-1.8	-2.5	-0.7	-1.3	-1.5	-2.5	-3.2	-2.4	-0.5	0.1
400	-0.4	-1.2	-0.3	-0.5	-0.6	-1.8	-3.0	-2.7	-0.6	0.1
500	0.3	-0.6	-0.0	-0.2	0.1	-1.1	-2.3	-2.1	-0.6	0.1
700	0.5	0.0	0.2	0.2	0.5	-0.1	-1.0	-0.9	-0.2	0.1
850	0.2	0.1	0.4	0.6	0.4	0.2	-0.2	-0.3	0.0	0.1
1000	-0.9	-0.0	0.4	1.1	0.1	0.1	0.3	0.1	0.1	0.0

TABLE 14e NORTHWARD FLUX OF EASTWARD MOMENTUM (m^2/s^2) BY THE STANDING EDDIES OF THE ZONAL WAVELENGTH 2 FOR 4-YEAR (1979-1982) AVERAGE MAY

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	6.0	4.7	0.9	0.2	-2.1	0.2	0.7	0.3	3.4	0.8
1	3.9	4.0	0.8	0.2	-2.1	0.3	0.9	0.3	3.1	0.8
2	3.0	3.5	0.7	0.2	-1.9	0.4	1.1	0.1	3.0	0.7
5	2.1	2.7	0.7	0.1	-1.4	0.6	1.3	-0.1	2.9	0.7
10	2.1	2.5	0.9	0.5	-0.6	0.7	1.0	-0.2	2.3	0.5
30	2.1	1.9	0.6	0.9	-0.2	-0.2	-0.0	-0.1	1.0	0.3
50	2.2	1.6	0.4	0.9	-0.8	-0.4	-0.9	-0.4	0.7	0.3
70	2.4	1.7	0.6	0.5	-1.3	-0.8	-1.7	-0.8	0.6	0.2
100	1.2	1.0	1.6	-0.1	-2.3	-1.4	-3.0	-1.4	0.4	0.2
150	-1.8	-1.2	2.8	0.2	-3.1	-2.1	-4.8	-2.4	-0.0	0.1
200	-2.1	-2.1	2.4	0.3	-3.2	-2.6	-6.9	-3.5	-0.3	0.1
250	-1.3	-1.8	1.5	0.0	-2.6	-2.8	-8.8	-4.9	-0.4	0.1
300	-0.4	-1.1	0.8	-0.0	-1.7	-2.7	-9.7	-5.8	-0.6	0.2
400	0.9	-0.1	0.0	0.4	-0.1	-2.3	-8.6	-5.4	-0.9	0.2
500	1.2	0.3	0.0	0.8	0.8	-1.8	-6.7	-4.2	-0.8	0.2
700	1.3	0.6	0.2	0.8	1.3	-0.5	-3.4	-2.0	-0.3	0.0
850	1.0	0.3	0.2	1.0	1.3	0.3	-1.4	-0.9	-0.2	0.0
1000	-0.1	-0.5	0.3	1.9	1.1	-0.7	-0.1	-0.3	-0.4	-0.1

TABLE 14f NORTHWARD FLUX OF EASTWARD MOMENTUM (m^2/s^2) BY THE STANDING EDDIES OF THE ZONAL WAVELENGTH 2 FOR 4-YEAR (1979-1982) AVERAGE JUNE

PRESSURE (MB)	LATITUDE (°N)									
	5	10	20	30	40	50	60	70	80	85
0.4	9.0	0.8	0.5	0.4	-1.8	0.3	0.1	0.5	1.5	0.0
1	6.5	0.5	0.5	0.6	-1.5	0.4	0.1	0.4	1.7	0.1
2	3.5	-0.1	0.4	0.8	-1.3	0.4	0.2	0.3	1.8	0.1
5	0.9	-0.8	0.3	1.0	-1.1	0.4	0.3	0.1	1.9	0.2
10	0.5	-0.7	0.3	1.1	-0.5	0.7	0.4	0.1	1.6	0.2
30	0.0	-0.3	0.3	1.0	0.5	0.7	0.4	0.2	0.4	0.0
50	-0.6	-0.2	0.2	0.9	0.4	0.5	0.3	0.2	0.2	-0.0
70	-0.3	0.2	0.6	1.1	0.2	0.4	0.2	0.2	0.2	-0.0
100	-0.0	0.8	1.8	1.8	0.1	0.5	0.0	0.1	0.1	0.0
150	-1.2	0.4	3.1	2.7	0.6	0.7	-0.1	-0.3	-0.0	0.0
200	-2.1	-0.3	2.3	2.5	1.0	0.8	-0.5	-0.9	-0.3	0.0
250	-2.4	-0.6	1.1	1.6	1.1	0.6	-1.0	-1.8	-0.7	-0.0
300	-2.2	-0.6	0.5	0.8	1.0	0.4	-1.4	-2.4	-0.9	-0.0
400	-1.2	-0.2	0.2	0.4	1.0	0.2	-1.5	-2.4	-0.9	-0.0
500	-0.3	-0.0	0.4	0.8	0.9	0.2	-1.4	-1.8	-0.6	-0.0
700	0.6	-0.0	0.5	1.2	0.7	0.4	-0.8	-0.9	-0.1	0.0
850	-0.0	-0.6	0.3	1.5	0.9	0.7	-0.3	-0.6	-0.0	0.1
1000	-1.6	-1.7	0.1	2.8	1.6	0.8	0.1	-0.4	0.0	0.0

TABLE 14g NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE JULY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	1.5	0.8	1.0	0.3	-0.8	1.5	1.1	0.4	1.9	0.5
1	2.8	0.9	1.3	0.4	-0.6	1.5	1.0	0.3	2.0	0.6
2	4.0	1.2	1.5	0.4	-0.4	1.4	0.9	0.3	2.0	0.6
5	2.9	0.9	1.1	0.4	-0.2	1.3	0.9	0.2	2.1	0.7
10	2.4	0.7	0.5	0.5	0.4	1.4	0.7	0.2	1.6	0.6
30	1.9	0.5	0.0	0.4	1.0	0.9	0.1	-0.0	0.2	0.1
50	1.3	0.3	-0.0	0.3	0.7	0.5	-0.2	-0.2	0.0	0.0
70	1.2	0.3	0.1	0.6	0.4	0.3	-0.3	-0.3	0.0	0.0
100	1.4	0.6	1.2	0.9	0.4	0.3	-0.5	-0.4	0.2	-0.0
150	0.7	0.7	2.7	1.2	0.6	0.5	-0.6	-0.7	0.4	0.0
200	0.2	0.4	2.2	1.1	1.1	0.6	-0.8	-0.7	0.6	0.1
250	0.1	0.3	1.3	0.6	1.3	0.3	-1.2	-0.6	1.1	0.1
300	0.0	0.2	0.7	0.0	0.9	0.0	-1.2	-0.3	1.5	0.2
400	0.3	0.1	-0.0	-0.3	0.4	-0.3	-0.8	-0.1	1.5	0.2
500	0.9	0.1	-0.3	0.2	0.2	-0.3	-0.4	0.0	1.1	0.1
700	1.1	0.3	-0.4	0.8	0.1	-0.1	0.1	0.2	0.5	0.0
850	-0.1	-0.3	-0.2	1.1	0.7	0.5	0.4	0.3	0.1	-0.0
1000	-2.3	-2.0	0.0	1.8	2.1	1.5	0.5	0.4	-0.3	-0.1

TABLE 14h NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE AUGUST

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	8.6	3.4	0.1	0.0	-1.9	0.9	0.9	0.7	2.7	0.8
1	8.6	2.9	0.1	0.1	-1.6	0.9	0.7	0.6	2.4	0.7
2	8.2	2.6	0.2	0.2	-1.2	0.8	0.7	0.5	2.0	0.6
5	6.4	2.1	0.0	0.3	-0.9	0.7	0.7	0.4	1.7	0.6
10	5.4	1.9	0.1	0.6	-0.3	0.9	0.6	0.2	1.0	0.4
30	4.2	1.4	0.1	0.6	0.5	0.5	0.1	0.1	0.0	0.1
50	3.7	1.3	0.1	0.4	0.2	0.2	-0.1	0.3	-0.2	0.0
70	3.9	1.5	0.3	0.6	0.1	0.1	-0.1	0.3	-0.3	-0.0
100	4.4	1.8	1.3	1.3	0.5	0.1	-0.0	0.3	-0.4	-0.0
150	2.6	1.3	2.4	2.4	1.8	0.7	0.3	0.0	-0.6	-0.1
200	1.0	0.7	2.1	2.5	2.4	1.2	0.5	-0.2	-1.0	-0.1
250	0.8	0.6	1.5	1.7	1.9	1.2	0.4	-0.3	-1.3	-0.2
300	0.8	0.5	1.0	0.9	0.8	1.0	0.1	-0.3	-1.4	-0.2
400	1.0	0.4	0.3	-0.0	-0.2	0.6	-0.3	-0.4	-1.1	-0.2
500	1.4	0.4	-0.1	-0.0	-0.3	0.4	-0.4	-0.3	-0.8	-0.2
700	1.1	0.7	-0.3	0.4	0.2	0.6	-0.3	-0.0	-0.3	-0.1
850	-0.2	0.3	-0.2	0.6	0.6	1.0	-0.1	0.0	-0.1	-0.1
1000	-2.3	-1.3	-0.2	0.8	1.2	1.4	0.0	-0.0	-0.1	0.0

TABLE 14i NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE SEPTEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	22.0	3.6	0.3	-1.8	-1.6	0.7	2.5	3.9	5.1	0.9
1	17.4	3.0	0.4	-1.7	-1.3	1.2	2.4	3.2	4.8	0.9
2	13.3	2.3	0.6	-1.6	-1.0	1.8	2.9	2.7	4.6	0.9
5	8.9	2.3	0.8	-1.4	-0.8	2.5	4.0	2.4	4.1	0.9
10	7.1	2.4	0.6	-0.9	-0.5	2.3	3.7	1.1	2.8	0.7
30	5.4	2.2	0.3	-0.0	0.2	0.7	1.3	-0.4	0.2	0.2
50	5.2	2.6	0.1	0.2	0.0	-0.1	0.2	-0.2	-0.4	0.1
70	5.4	2.9	0.4	0.5	-0.3	-0.2	-0.2	-0.2	-0.6	0.0
100	5.8	3.2	1.5	1.2	-0.8	0.1	-0.6	-0.4	-0.7	0.0
150	4.3	2.4	2.7	2.8	-0.5	1.4	-0.9	-0.8	-0.7	-0.0
200	2.7	1.2	2.3	3.2	-0.2	2.2	-1.5	-1.3	-0.6	-0.0
250	2.2	0.8	1.6	2.3	-0.2	1.8	-2.3	-1.7	-0.3	0.0
300	1.9	0.8	1.1	1.2	-0.4	0.9	-2.7	-1.7	-0.1	0.1
400	1.3	0.5	0.5	0.2	-0.4	-0.2	-2.4	-1.4	-0.0	0.0
500	1.2	0.4	0.3	0.2	-0.1	-0.5	-1.7	-1.0	0.0	0.0
700	1.1	0.4	0.1	0.5	0.3	-0.1	-0.7	-0.5	0.1	0.0
850	0.5	0.1	-0.2	0.3	0.3	0.3	-0.1	-0.2	0.1	0.0
1000	-0.5	-0.5	-0.3	0.1	0.4	0.5	0.4	0.1	-0.0	-0.0

TABLE 14j NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE OCTOBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	10.7	0.8	-1.2	-5.0	-3.6	2.5	9.4	3.2	6.5	1.3
1	9.7	1.1	-1.0	-5.1	-2.6	4.1	10.3	2.2	6.7	1.4
2	8.4	1.3	-1.1	-5.3	-2.3	5.9	11.2	1.4	7.1	1.5
5	6.2	1.3	-0.8	-5.1	-2.4	6.8	12.9	0.5	7.2	1.5
10	5.6	1.7	-0.5	-3.5	-1.1	5.9	10.7	-1.1	4.8	1.1
30	4.3	1.6	-0.4	-1.1	1.0	2.8	3.7	-1.3	0.2	0.1
50	3.5	1.2	-0.4	-0.5	1.4	1.8	1.3	-1.2	-0.6	-0.1
70	3.1	1.1	-0.1	0.3	2.0	2.0	0.4	-1.4	-0.7	-0.2
100	2.1	1.0	1.0	2.4	3.5	3.2	0.3	-2.0	-0.6	-0.1
150	-0.5	-0.4	3.1	5.6	5.5	5.3	-1.3	-3.2	-0.7	-0.1
200	-1.1	-1.0	3.3	5.8	5.4	6.0	-2.5	-4.5	-0.9	-0.1
250	-0.0	-0.6	2.4	4.1	4.0	5.3	-3.8	-5.4	-0.9	-0.0
300	1.1	-0.0	1.4	2.4	2.7	4.1	-4.4	-5.6	-0.9	-0.0
400	2.0	0.6	0.2	0.6	1.1	1.9	-4.0	-4.4	-0.7	-0.0
500	2.1	0.7	-0.1	0.2	0.5	0.7	-2.9	-3.0	-0.4	-0.0
700	1.4	0.5	-0.0	0.1	0.1	0.0	-1.0	-1.2	-0.1	0.0
850	0.7	0.1	-0.1	-0.0	-0.0	0.2	0.1	-0.4	-0.1	-0.0
1000	-0.1	-0.2	-0.2	-0.3	-0.3	0.3	1.2	0.4	-0.1	-0.1

TABLE 14k NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE NOVEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-0.4	3.3	4.1	3.8	2.8	3.9	18.2	7.4	12.7	2.3
1	2.2	2.3	2.7	1.9	1.1	3.0	18.8	7.7	12.4	2.2
2	4.2	2.1	1.0	0.3	0.8	4.1	20.5	7.4	11.9	2.0
5	7.3	1.7	-0.6	-2.8	0.6	6.0	19.5	3.9	9.8	1.6
10	8.7	1.9	-0.7	-2.7	1.1	5.5	15.1	1.0	5.9	0.9
30	9.1	2.5	-0.7	-0.7	2.1	3.2	6.7	-0.9	-0.6	-0.1
50	8.2	2.2	-0.5	-0.0	2.4	2.7	3.9	-1.4	-1.7	-0.3
70	7.0	1.8	0.1	0.9	2.9	2.7	2.6	-1.7	-1.9	-0.3
100	3.4	0.8	1.9	3.2	4.2	3.5	1.7	-2.6	-1.8	-0.3
150	-1.8	-1.6	3.9	6.5	6.0	5.0	0.6	-4.2	-1.6	-0.2
200	-2.9	-2.3	3.8	6.8	6.3	5.4	-0.5	-6.0	-1.6	-0.0
250	-1.7	-1.8	2.9	5.5	5.6	4.7	-1.8	-7.6	-1.4	0.1
300	-0.1	-1.1	1.9	3.9	4.4	3.6	-2.8	-8.2	-1.1	0.1
400	1.6	-0.4	0.7	1.7	2.4	1.8	-3.3	-6.8	-0.7	0.1
500	2.2	-0.1	0.2	0.7	1.2	0.9	-2.7	-4.4	-0.5	0.0
700	1.1	-0.1	0.2	0.2	0.1	0.2	-1.1	-1.2	-0.1	0.0
850	-0.1	-0.3	0.1	-0.0	-0.3	-0.0	0.1	0.5	-0.0	-0.0
1000	-0.8	-0.4	-0.2	-0.2	-0.6	-0.3	2.4	1.6	0.2	-0.0

TABLE 14l NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE STANDING EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE DECEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	36.0	4.0	1.8	13.7	36.8	69.5	50.8	10.0	16.4	3.6
1	29.4	3.3	1.3	9.9	26.5	55.6	50.9	6.6	16.0	3.7
2	10.6	2.0	0.8	5.7	20.4	50.3	55.4	3.8	15.8	3.8
5	2.7	1.4	0.1	0.6	14.2	43.2	53.4	-2.0	15.2	3.9
10	2.1	0.9	-0.5	-1.8	9.9	31.6	39.8	-8.2	12.4	3.4
30	1.8	-0.1	-0.8	-1.3	4.4	8.0	9.2	-11.9	4.6	1.8
50	1.2	-0.2	-0.4	0.3	3.3	0.9	-1.1	-10.8	2.0	1.1
70	0.3	-0.2	0.1	1.7	3.1	-1.6	-5.2	-9.8	1.1	0.8
100	-0.9	-0.6	1.1	3.4	3.4	-2.8	-7.7	-9.0	0.3	0.5
150	-2.8	-2.3	1.9	4.5	3.5	-3.7	-9.5	-8.6	-0.6	0.1
200	-3.0	-2.9	2.0	3.8	2.5	-4.4	-10.8	-9.0	-1.1	-0.0
250	-2.0	-2.4	1.6	2.7	0.7	-5.0	-11.6	-9.3	-1.6	-0.2
300	-0.5	-1.7	1.1	1.8	-0.8	-5.1	-11.4	-8.9	-1.9	-0.3
400	0.8	-0.8	0.6	0.9	-1.8	-4.1	-9.1	-6.8	-2.0	-0.3
500	1.1	-0.4	0.3	0.6	1.7	-2.6	-6.4	-4.7	-1.5	-0.2
700	0.6	-0.5	0.2	0.2	-0.9	-0.5	-2.5	-2.0	-0.2	0.0
850	-0.4	-0.4	0.2	-0.1	-0.7	0.2	-0.8	-0.6	0.2	0.1
1000	-0.7	0.1	0.1	-0.4	-0.9	-0.3	0.6	0.4	-0.0	0.0

TABLE 15a NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JANUARY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	15.6	54.0	28.1	80.0	173.8	163.6	132.8	78.7	26.4	8.1
1	8.5	34.0	19.6	54.8	120.8	127.7	109.7	56.1	20.1	6.7
2	-1.6	11.8	12.8	39.2	89.4	105.5	92.9	42.2	16.7	5.4
5	3.1	-2.9	8.5	23.6	52.8	68.5	61.4	24.1	9.0	3.8
10	13.6	-1.3	8.7	17.0	34.0	54.9	53.5	20.2	1.4	0.3
30	19.5	1.5	7.2	7.8	13.4	29.2	32.5	14.2	-0.4	-2.1
50	19.6	4.4	6.8	8.7	9.1	17.5	18.1	7.0	-3.0	-3.7
70	18.8	5.9	5.9	8.2	9.2	12.8	11.5	3.6	-4.1	-4.4
100	-2.5	2.7	5.7	12.5	12.1	9.8	7.1	1.4	-4.1	-4.5
150	-19.0	2.0	9.7	22.6	19.8	8.5	4.2	-0.1	-3.3	-4.1
200	-17.0	2.4	11.4	30.5	27.0	8.6	3.2	-1.3	-2.5	-3.5
250	-13.4	2.4	11.2	32.9	29.3	8.6	2.9	-2.5	-1.6	-2.6
300	-10.1	2.4	10.2	30.7	20.9	8.3	2.8	-3.1	-0.9	-1.9
400	-5.2	2.3	7.6	22.2	19.1	7.5	2.6	-2.9	-0.2	-1.3
500	-3.9	1.5	5.3	14.5	12.9	6.1	2.4	-2.2	-0.1	-0.7
700	-4.3	0.6	2.3	5.7	6.3	2.7	1.3	-1.3	-0.2	-0.1
850	-3.2	0.3	0.9	2.6	4.5	-0.4	0.3	-0.6	-0.4	-0.2
1000	-2.2	0.1	0.6	1.8	4.8	-4.1	-0.5	0.8	-0.4	-0.3

TABLE 15b NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE FEBRUARY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	192.1	64.8	50.4	89.2	157.4	196.7	172.9	75.5	5.4	-4.1
1	133.9	43.8	36.9	64.2	117.7	162.8	157.7	67.8	4.6	-4.3
2	71.6	23.5	25.1	45.5	89.5	137.5	145.6	58.1	-0.2	-5.7
5	25.9	11.0	17.2	28.3	55.2	91.8	109.3	33.3	-12.7	-8.2
10	18.4	8.0	14.9	19.2	34.5	61.1	74.6	13.4	-16.0	-6.3
30	8.2	4.6	11.9	10.0	12.5	24.7	31.9	-1.2	-11.5	-2.4
50	4.1	4.3	10.8	10.2	8.4	14.8	18.7	-1.8	-8.6	-1.2
70	2.7	4.3	11.0	13.3	8.4	10.7	11.6	-1.7	-6.6	-0.2
100	-15.0	1.3	10.9	20.7	11.5	8.4	6.2	-1.2	-5.3	0.1
150	-20.5	0.3	13.4	33.3	18.8	7.6	1.7	-1.4	-4.1	0.4
200	-13.5	1.2	15.1	38.3	24.5	7.5	-0.9	-2.5	-3.0	0.8
250	-7.7	2.5	14.8	36.0	25.3	6.8	-2.7	-3.5	-2.7	0.9
300	-1.8	3.6	13.0	30.9	22.4	5.6	-3.5	-3.4	-2.7	0.9
400	4.9	4.1	9.1	21.1	15.7	4.3	-2.9	-2.3	-2.1	0.9
500	3.8	2.8	6.6	13.9	11.0	3.8	-1.9	-1.8	-1.3	0.8
700	0.8	1.3	3.2	5.6	5.4	2.0	-1.7	-1.8	-0.7	0.4
850	2.1	1.3	1.4	2.7	3.3	-0.4	-2.9	-1.5	-0.3	0.2
1000	2.6	0.8	1.5	2.4	3.4	-3.6	-4.1	-0.6	0.2	0.1

TABLE 15c NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MARCH

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	87.3	56.9	24.5	26.1	45.0	42.9	45.7	15.3	-2.1	-3.0
1	90.2	47.2	22.9	23.6	36.6	38.8	45.1	18.4	0.6	-0.2
2	93.4	39.0	21.2	21.4	31.9	41.0	49.8	19.4	0.5	-0.5
5	84.7	27.7	18.5	19.1	25.0	40.1	54.7	20.0	-3.6	-4.0
10	71.5	21.1	15.4	16.4	17.6	32.0	46.3	13.5	-8.8	-7.0
30	64.5	18.4	10.4	12.6	7.5	13.6	18.9	3.1	-8.1	-7.0
50	59.0	18.1	9.5	12.7	5.4	7.2	9.3	1.8	-3.9	-4.6
70	55.8	19.7	9.7	14.8	6.5	5.2	5.1	1.7	-1.2	-2.9
100	28.2	11.2	8.9	20.4	10.4	4.5	1.9	1.3	-0.6	-2.1
150	10.6	4.8	9.8	32.8	18.3	4.6	-0.9	0.2	-1.4	-1.7
200	12.9	3.8	11.6	40.5	24.8	4.8	-3.2	-1.4	-2.3	-1.3
250	10.7	2.9	11.9	39.8	26.1	3.6	-5.8	-2.7	-2.9	-1.1
300	6.9	2.7	10.6	33.7	23.3	1.8	-7.2	-3.1	-2.8	-0.8
400	3.1	2.4	7.0	22.0	16.0	0.5	-8.4	-2.0	-1.9	-0.0
500	-0.2	1.3	4.4	14.0	10.5	0.9	-4.1	-0.8	-1.1	0.6
700	-0.1	0.7	1.4	4.9	5.2	1.1	-1.7	0.4	-0.3	0.9
850	3.2	0.9	0.4	1.9	4.2	0.1	-1.4	0.8	0.2	0.9
1000	2.3	0.6	1.1	1.3	5.6	-1.6	-1.4	1.1	0.5	0.6

TABLE 15d NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE APRIL

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	32.6	17.1	5.5	7.5	10.4	5.8	11.0	9.1	11.9	1.2
1	45.7	19.2	5.6	6.9	9.5	4.8	9.6	6.3	9.8	3.4
2	50.4	19.9	5.5	7.0	10.4	6.1	10.3	4.3	6.8	3.6
5	56.1	18.0	3.9	5.9	12.2	9.0	12.3	3.4	3.4	2.7
10	57.4	17.2	1.9	6.0	10.8	9.0	13.0	3.5	1.2	1.5
30	50.3	14.2	2.2	6.5	5.3	4.0	7.2	0.3	-0.6	0.1
50	45.2	10.6	3.6	7.6	4.7	1.8	2.9	-1.9	-1.3	-0.4
70	44.9	9.2	5.0	10.4	6.1	1.4	0.7	-2.7	-1.7	-0.8
100	19.7	5.5	5.6	17.0	10.6	1.9	-1.1	-3.4	-1.9	-1.0
150	-3.8	4.2	10.0	27.8	20.3	3.9	-2.9	-4.1	-1.5	-1.0
200	-4.6	4.6	12.2	31.9	27.7	6.1	-4.7	-5.1	-0.4	-0.7
250	-2.7	4.3	11.4	29.1	29.3	6.7	-6.4	-6.4	0.7	-0.2
300	0.1	3.7	9.2	23.9	25.9	5.7	-7.2	-7.1	1.7	0.3
400	2.2	2.4	5.2	15.2	16.9	3.6	-6.0	-5.6	2.7	0.8
500	1.1	1.6	3.3	9.8	10.4	2.7	-4.0	-3.1	2.7	0.8
700	1.0	1.3	1.4	4.1	4.3	1.1	-1.6	-0.3	2.0	0.6
850	1.9	1.0	0.5	2.2	3.4	-0.1	-0.9	0.5	1.1	0.3
1000	2.7	0.5	1.1	2.2	4.8	-1.0	-0.2	0.9	-0.0	0.0

TABLE 15e NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE MAY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	20.2	-11.5	2.3	1.6	4.3	2.3	-0.2	0.7	1.5	0.2
1	30.1	-7.5	3.0	2.9	3.6	1.2	-0.5	0.1	1.1	0.1
2	37.2	-4.5	3.3	3.9	3.6	0.6	-0.5	-0.5	0.9	0.1
5	35.6	-2.5	2.7	4.6	3.8	0.5	-0.2	-0.4	0.8	0.1
10	35.6	-1.3	1.6	4.5	3.4	0.8	0.1	0.1	0.3	-0.0
30	35.4	2.8	1.4	4.0	3.0	0.7	0.1	0.4	0.2	-0.0
50	34.6	5.7	2.2	4.6	3.5	0.6	-0.1	0.3	0.1	-0.2
70	34.8	7.5	3.3	6.0	4.8	0.8	-0.2	0.2	0.0	-0.3
100	23.3	5.4	4.5	9.7	8.1	1.4	-0.6	0.1	-0.0	-0.6
150	14.8	2.5	7.7	18.1	15.5	2.9	-1.5	0.1	0.3	-0.6
200	11.4	1.6	8.9	21.4	21.3	5.4	-2.6	0.1	1.2	-0.3
250	8.4	1.1	7.9	19.4	21.8	7.2	-3.8	-0.0	2.6	0.1
300	6.9	0.6	6.0	15.7	18.7	7.1	-4.3	-0.1	3.9	0.4
400	4.2	0.1	2.9	9.9	11.5	4.9	-3.5	0.7	4.6	0.5
500	1.9	-0.1	1.4	6.5	6.6	3.1	-2.3	1.3	4.0	0.6
700	0.7	0.2	0.3	2.6	2.2	0.7	-1.0	1.3	2.3	0.7
850	-0.1	0.3	0.3	1.2	1.8	-0.4	-0.8	1.0	1.4	0.5
1000	-2.2	-0.2	0.6	1.6	3.1	-0.2	-0.2	0.7	0.7	0.3

TABLE 15f NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JUNE

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-15.0	-2.1	-1.5	-4.4	3.9	1.1	1.4	0.8	1.4	-0.4
1	-18.1	-0.8	-0.9	-2.9	3.4	0.7	1.2	0.4	1.0	-0.4
2	-22.1	-1.0	-0.1	-1.8	2.9	0.4	1.1	0.1	0.8	-0.3
5	-26.9	-1.8	0.5	-0.6	2.4	0.1	1.3	-0.2	0.5	-0.4
10	-27.4	-0.6	0.1	-0.2	2.5	0.1	1.1	0.1	0.4	-0.3
30	-27.3	0.9	0.7	-0.1	2.9	0.8	0.9	0.5	0.5	0.0
50	-29.2	1.0	1.8	0.4	3.1	1.2	1.0	0.4	0.4	0.0
70	-29.6	1.3	2.1	1.8	3.7	1.6	0.9	0.2	0.4	0.0
100	-17.0	1.6	2.5	5.1	6.8	2.7	0.7	-0.1	0.3	0.1
150	-5.4	2.2	5.5	11.9	15.9	6.3	0.2	-1.0	0.0	-0.0
200	-8.0	1.7	6.7	14.5	22.5	10.4	-0.6	-1.9	0.2	-0.2
250	-6.6	1.4	5.6	12.7	22.2	11.9	-1.5	-2.7	1.1	0.0
300	-4.7	1.3	4.0	9.8	18.3	10.9	-1.9	-2.7	2.0	0.4
400	-2.8	1.1	2.0	5.8	11.3	8.1	-1.8	-2.0	2.6	0.7
500	-1.6	0.9	0.9	3.8	6.9	5.6	-1.4	-1.2	2.3	0.6
700	-0.2	0.2	0.1	1.7	2.6	2.2	-0.7	0.1	1.3	0.3
850	-0.6	-0.4	-0.1	0.9	1.9	0.7	-0.3	0.6	0.6	0.2
1000	-1.3	-1.1	-0.0	0.5	2.8	0.5	0.1	0.7	0.0	0.2

TABLE 15g NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE JULY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-32.5	-22.1	5.1	2.7	1.5	-0.4	1.8	1.7	0.1	0.9
1	-30.4	-17.6	6.1	3.3	1.4	-0.3	1.5	1.4	-0.1	0.8
2	-28.8	-13.7	6.7	4.1	1.3	-0.2	1.2	1.2	-0.1	0.8
5	-29.8	-11.1	6.8	4.2	1.4	-0.4	0.7	1.0	-0.2	0.7
10	-27.6	-10.9	5.6	3.6	1.7	0.2	0.7	0.9	-0.3	0.4
30	-24.1	-10.1	3.1	2.3	2.0	0.8	0.8	-0.1	0.3	0.3
50	-23.1	-8.9	2.3	2.1	2.1	0.9	0.9	0.0	0.4	0.3
70	-22.5	-8.0	1.7	2.4	2.4	1.2	1.2	0.0	0.2	0.2
100	-6.7	-3.8	1.4	2.9	4.2	3.0	1.6	-0.0	0.0	0.2
150	2.9	0.1	3.2	5.6	9.8	9.0	2.8	-0.3	0.0	0.4
200	2.4	0.3	4.3	7.2	13.3	15.0	4.4	-0.5	0.5	0.7
250	1.3	0.3	4.0	6.9	12.6	16.6	4.9	-0.6	1.2	1.1
300	1.1	0.3	3.2	5.9	10.2	14.6	4.4	-0.6	1.7	1.4
400	1.3	0.4	2.0	3.8	6.5	9.9	3.2	-0.7	1.9	1.4
500	1.9	0.7	1.2	2.4	4.4	6.7	2.4	-0.7	1.4	1.2
700	3.5	0.8	0.3	1.1	2.2	2.6	1.0	-0.5	0.5	0.7
850	2.1	0.7	0.1	0.6	1.9	0.8	0.2	-0.2	0.0	0.5
1000	-0.3	0.1	0.0	0.4	2.7	0.3	-0.1	0.1	-0.4	0.2

TABLE 15i NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE SEPTEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-24.6	-1.0	-4.2	-2.4	1.3	4.6	7.4	5.6	4.2	2.3
1	-17.2	4.4	-1.9	-1.3	0.8	3.1	5.3	2.7	2.4	1.8
2	-13.5	7.4	-0.2	-0.7	0.4	2.2	4.6	1.3	1.7	1.5
5	-11.4	8.3	1.1	0.1	1.1	1.6	3.9	0.6	1.1	1.2
10	-11.4	6.1	1.2	0.0	2.0	1.3	2.7	0.2	0.5	0.8
30	-15.3	-0.2	1.6	-0.5	2.7	0.8	0.9	-0.3	0.0	0.1
50	-18.6	-2.4	2.2	-0.3	2.8	0.8	0.3	-0.7	-0.2	-0.1
70	-20.0	-3.2	2.7	0.2	3.1	0.9	0.3	-0.8	-0.4	-0.2
100	-9.0	-2.9	3.5	1.7	6.0	2.6	0.3	-1.0	-0.7	-0.3
150	0.7	-0.5	5.6	6.5	14.7	7.6	-0.5	-2.0	-0.9	-0.2
200	1.7	0.2	5.8	9.5	20.1	11.5	-2.6	-3.9	-0.8	-0.2
250	1.7	0.0	4.9	9.3	19.3	11.8	-4.9	-6.2	-0.5	-0.2
300	1.4	-0.4	3.9	7.4	15.4	9.7	-5.7	-7.0	-0.4	-0.1
400	0.4	-0.8	2.2	4.1	8.3	5.9	-4.2	-5.0	-0.1	0.1
500	-0.7	-0.7	1.3	2.4	4.5	3.8	-2.6	-2.8	0.2	0.3
700	0.3	0.1	0.6	1.1	1.7	1.0	-1.4	-0.7	0.6	0.4
850	0.4	0.3	0.4	1.0	1.6	-0.9	-1.6	-0.2	0.7	0.5
1000	-1.0	0.2	0.4	1.3	3.3	-1.9	-1.7	0.1	0.9	0.7

TABLE 15k NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE NOVEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.2	-0.4	9.0	17.2	39.6	32.7	25.8	17.1	-0.1	2.9
1	11.2	0.2	9.9	16.1	32.0	31.0	29.1	21.6	-3.6	0.4
2	12.1	-0.2	11.4	16.6	28.8	32.1	33.6	27.5	-6.4	-2.3
5	4.3	-2.7	9.9	14.9	24.0	28.8	31.5	23.3	-10.5	-5.7
10	-1.1	-4.7	5.6	9.8	15.8	19.5	21.6	14.1	-9.7	-5.9
30	-2.1	-5.8	3.1	5.5	6.6	5.4	5.9	2.7	-4.9	-3.9
50	-1.6	-5.4	4.7	6.1	5.5	2.2	1.4	-0.0	-3.5	-2.9
70	-0.2	-4.9	5.4	7.4	6.2	2.0	-0.2	-1.1	-2.7	-2.2
100	3.8	-3.3	5.6	11.8	10.9	3.4	-0.8	-1.8	-1.8	-1.3
150	-0.5	-2.0	7.7	21.5	22.3	7.9	-0.9	-2.1	-1.2	-0.5
200	-2.8	-1.9	8.8	27.3	31.8	13.4	-0.8	-2.2	-0.9	-0.4
250	-3.6	-1.5	8.3	27.2	35.4	16.7	-1.3	-2.1	-0.2	-0.4
300	-3.2	-0.7	6.8	23.5	32.6	16.3	-1.6	-1.5	0.5	-0.2
400	-2.1	0.6	4.3	15.0	20.8	11.6	-0.7	0.5	0.7	-0.1
500	-1.5	1.0	2.8	9.3	11.0	7.6	0.7	1.7	0.4	-0.1
700	-0.9	0.8	1.3	3.7	2.9	3.0	1.6	1.9	-0.2	-0.2
850	-0.8	0.8	0.8	1.9	2.0	1.1	1.3	1.7	-0.4	-0.3
1000	1.4	0.0	0.8	1.6	3.5	-0.2	1.6	1.4	-0.0	-0.5

TABLE 15h NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE AUGUST

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-49.4	-19.9	2.7	1.0	1.8	0.2	-0.2	1.2	1.1	1.6
1	-33.1	-15.5	3.7	0.9	1.8	0.2	-0.8	0.7	0.7	1.4
2	-20.7	-11.5	4.9	0.9	1.8	0.3	-1.1	0.6	0.5	1.3
5	-14.5	-9.1	5.1	1.4	1.6	0.5	-0.9	0.8	0.4	1.1
10	-12.0	-8.2	3.7	2.0	2.2	0.9	-0.6	0.8	0.2	0.6
30	-9.6	-7.3	1.8	1.9	2.5	1.3	-0.1	0.7	0.4	0.0
50	-9.2	-6.7	1.6	1.5	2.5	1.5	-0.2	0.6	0.6	-0.1
70	-10.4	-6.7	1.5	1.6	2.8	2.1	-0.3	0.5	0.7	-0.1
100	-6.3	-4.7	0.9	2.6	4.2	4.1	-0.4	0.1	1.0	-0.1
150	-5.8	-2.9	1.0	5.5	8.7	9.4	-0.7	-1.1	1.2	0.2
200	-4.3	-2.0	1.8	7.1	11.4	13.8	-1.5	-2.7	1.6	0.6
250	-2.6	-1.3	2.0	6.8	10.8	14.4	-2.5	-3.9	2.2	1.1
300	-1.3	-1.1	2.0	5.6	8.5	12.3	-3.0	-3.8	2.7	1.4
400	1.0	-0.6	1.7	3.3	4.7	8.0	-2.1	-2.6	2.8	1.6
500	2.1	-0.2	1.3	2.0	2.7	5.3	-1.0	-1.4	2.9	1.7
700	2.5	0.2	0.8	0.7	1.1	2.1	0.3	0.2	2.5	1.6
850	-0.3	0.1	0.7	0.1	1.2	0.6	-0.3	0.8	1.8	1.4
1000	-3.2	-0.2	0.6	0.2	2.4	-0.0	-0.4	1.2	0.9	1.1

TABLE 15j NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1982) AVERAGE OCTOBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-15.0	5.9	9.4	10.0	32.8	53.8	47.0	48.6	13.8	2.2
1	-17.6	6.0	9.2	7.7	25.0	40.2	33.7	32.3	9.6	2.5
2	-18.5	3.4	8.3	5.3	18.9	29.9	25.2	22.3	6.9	2.3
5	-20.5	-0.2	7.4	1.9	9.5	16.0	17.4	14.1	5.2	2.0
10	-19.5	-3.0	5.5	1.4	6.0	9.4	12.1	8.6	3.6	1.5
30	-16.3	-4.6	4.0	1.3	4.2	3.7	4.0	1.6	0.6	0.4
50	-14.9	-4.1	4.7	2.0	3.7	2.1	1.2	-0.3	-0.1	0.1
70	-15.0	-4.3	5.0	3.1	4.2	1.6	-0.2	-1.1	-0.4	0.0
100	-5.6	-4.3	6.3	6.3	7.6	2.7	-1.1	-1.8	-0.7	0.0
150	7.3	-0.1	8.2	13.7	17.0	11.1	-2.1	-2.8	-0.8	0.1
200	0.3	-1.4	9.3	17.0	24.4	7.1	-3.8	-4.6	-0.7	0.3
250	-1.5	-1.9	8.7	16.0	25.9	12.5	-5.8	-6.7	-0.5	0.5
300	-0.1	-1.1	6.9	13.2	22.5	11.0	-6.5	-7.8	-0.5	0.3
400	0.5	0.0	4.1	8.4	13.5	7.0	-4.6	-6.2	-0.5	-0.3
500	-0.1	0.5	2.6	5.9	7.5	4.6	-2.1	-3.8	-0.4	-0.3
700	0.8	1.4	1.3	3.5	3.0	1.9	-0.6	-1.3	-0.2	-0.2
850	-0.6	1.4	1.0	2.5	2.5	0.1	-0.9	-0.9	0.2	0.1
1000	-1.7	1.1	0.9	2.3	4.0	-1.4	-0.9	0.4	0.9	0.7

TABLE 15p NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES FOR NORTHERN HEMISPHERE 4-YEAR (1979-1981) AVERAGE DECEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	45.3	16.8	17.8	35.0	82.5	60.1	38.9	24.2	3.2	0.2
1	32.2	14.1	15.3	29.8	61.7	53.8	36.7	15.8	-2.2	0.1
2	13.5	12.3	13.1	25.2	47.0	48.3	34.1	10.1	-6.2	-0.5
5	-2.0	14.0	11.1	19.1	32.4	32.9	23.9	3.5	-8.7	-1.0
10	-5.4	14.7	8.9	13.7	22.1	21.8	17.0	0.4	-10.4	-2.0
30	-6.9	14.7	5.5	8.3	8.9	9.1	8.2	-3.9	-8.7	-2.0
50	-8.5	14.0	6.1	8.2	6.1	5.4	3.5	-5.2	-7.0	-1.8
70	-11.3	12.8	7.2	10.2	6.3	4.6	0.9	-5.6	-5.9	-1.5
100	-12.4	8.9	8.5	16.4	9.4	5.3	-1.1	-6.5	-4.9	-1.0
150	-8.2	4.8	12.9	28.0	18.6	7.8	-2.9	-7.9	-3.8	0.2
200	-9.4	3.2	15.0	33.9	27.5	10.5	-4.4	-9.1	-2.8	1.2
250	-9.5	3.2	14.2	33.7	30.8	11.8	-6.0	-10.0	-1.8	1.9
300	-7.7	3.8	11.8	29.9	28.4	11.1	-6.8	-9.8	-1.1	2.4
400	-3.0	4.1	6.8	19.8	19.2	7.6	-5.4	-7.7	-0.6	2.3
500	-0.7	3.1	3.7	11.7	11.1	4.4	-3.4	-5.4	-0.7	1.4
700	0.9	1.8	0.9	3.9	3.4	1.0	-2.0	-2.5	-0.5	0.3
850	1.5	1.4	0.1	1.8	2.8	-0.9	-2.3	-1.3	-0.2	-0.2
1000	-0.8	1.2	0.2	1.6	4.8	-3.7	-2.7	0.1	0.1	-0.6

TABLE 16a NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE JANUARY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	12.9	-0.5	6.0	19.2	35.0	39.7	46.1	36.1	10.5	4.4
1	-7.6	0.1	4.1	12.5	23.8	29.6	34.2	20.6	4.3	3.2
2	-4.2	-0.0	2.7	8.1	16.3	23.7	25.3	11.0	0.4	1.9
5	-0.8	0.6	1.6	4.7	7.8	12.3	12.4	3.2	-2.9	1.3
10	0.0	0.8	0.7	2.9	4.9	12.5	15.2	6.7	-3.8	-1.3
30	-0.0	0.6	0.1	1.0	3.1	10.1	13.8	10.5	-2.1	-2.6
50	-0.1	0.6	0.0	0.6	2.1	6.8	9.2	7.5	-3.5	-4.0
70	-0.1	0.6	-0.0	0.5	1.6	5.0	6.8	5.4	-4.3	-4.7
100	-0.2	0.6	-0.1	0.8	1.4	3.6	4.9	4.0	-4.0	-4.7
150	-0.0	0.6	-0.2	1.0	1.6	2.7	3.5	3.4	-2.9	-4.2
200	0.1	0.5	-0.1	1.1	1.9	2.4	2.9	3.3	-1.8	-3.6
250	0.1	0.4	-0.1	1.1	2.0	2.3	2.6	3.4	-0.8	-2.7
300	0.0	0.4	0.0	0.9	1.8	2.2	2.3	3.2	-0.1	-2.0
400	0.0	0.4	0.2	0.7	1.3	1.8	1.8	2.5	0.2	-1.4
500	0.1	0.3	0.2	0.5	0.9	1.4	1.2	1.8	0.1	-0.9
700	0.1	0.2	0.2	0.3	0.9	0.7	0.7	0.8	-0.0	-0.2
850	-0.0	0.1	0.1	0.1	0.0	0.4	0.6	0.3	-0.2	-0.2
1000	-0.2	-0.0	0.0	-0.0	-0.2	0.1	0.5	0.1	-0.3	-0.2

TABLE 16c NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE MARCH

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	21.6	15.7	6.5	9.9	20.7	26.4	26.2	11.8	-1.2	-4.2
1	15.4	10.4	4.8	7.4	15.5	21.3	25.5	12.1	0.5	-1.0
2	9.6	5.6	3.4	5.0	11.0	17.0	22.8	11.4	-0.7	-0.8
5	3.8	1.0	2.0	2.9	6.1	10.7	17.6	7.2	-5.5	-3.7
10	1.9	-0.3	1.5	1.9	3.6	6.9	13.4	2.4	-10.7	-6.8
30	2.4	-0.0	1.3	1.0	1.4	3.0	6.9	-0.3	-11.1	-7.2
50	2.3	0.1	1.1	0.8	0.9	1.7	4.1	1.2	-6.4	-4.9
70	2.1	0.2	1.0	1.0	0.9	1.2	2.6	2.0	-3.0	-3.2
100	1.2	0.2	0.7	1.5	1.0	0.8	1.7	2.1	-1.5	-2.3
150	-0.5	-0.2	0.4	1.8	1.3	0.4	1.3	1.3	-1.0	-1.7
200	-0.7	-0.4	0.3	1.6	1.5	0.3	1.4	0.5	-0.7	-1.2
250	-0.2	-0.3	0.3	1.4	1.5	0.3	1.6	-0.1	-0.5	-0.9
300	0.1	-0.0	0.3	1.1	1.3	0.3	1.6	-0.4	-0.2	-0.6
400	-0.3	0.1	0.2	0.7	1.0	0.4	1.3	-0.4	0.3	0.2
500	-0.8	0.0	0.2	0.5	0.7	0.5	1.0	-0.2	0.3	0.7
700	-1.0	-0.2	0.2	0.2	0.3	0.4	0.5	0.0	0.4	0.9
850	-0.6	-0.2	0.1	0.1	0.2	0.2	0.2	-0.0	0.7	0.9
1000	-0.1	-0.1	0.1	-0.0	0.3	0.0	0.1	-0.2	1.0	0.7

TABLE 16e NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE MAY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-4.3	-1.6	-0.2	0.6	0.3	0.9	1.8	1.0	0.9	0.2
1	-1.8	-0.9	-0.0	0.4	-0.0	0.3	1.3	0.5	0.7	0.2
2	-0.4	-0.6	0.2	0.2	-0.2	-0.2	1.0	0.1	0.6	0.2
5	0.6	-0.3	0.5	0.0	-0.5	-0.6	0.7	-0.1	0.5	0.1
10	0.6	-0.2	0.5	0.0	-0.3	-0.5	0.5	0.0	0.2	0.0
30	0.6	-0.0	0.2	0.0	0.0	-0.1	0.2	0.2	0.2	0.0
50	0.5	-0.0	0.1	0.0	0.1	-0.1	0.0	0.1	0.1	-0.1
70	0.5	-0.1	0.0	0.1	0.2	-0.1	-0.1	0.1	-0.0	-0.3
100	0.4	-0.1	0.1	0.2	0.2	-0.0	-0.1	0.1	-0.2	-0.5
150	0.5	-0.2	0.2	0.1	0.0	-0.0	-0.0	0.3	-0.1	-0.7
200	0.2	-0.1	0.1	0.0	-0.1	0.1	0.1	0.7	0.4	-0.5
250	0.0	-0.1	0.0	-0.0	-0.2	0.1	0.2	1.0	0.9	-0.1
300	-0.0	-0.1	-0.0	-0.1	-0.1	0.1	0.2	1.1	1.4	0.0
400	-0.0	-0.1	-0.1	-0.1	0.0	0.0	0.0	0.9	1.8	0.0
500	-0.1	-0.1	-0.1	-0.0	0.1	-0.1	-0.1	0.6	1.7	0.3
700	-0.4	-0.2	-0.1	0.1	0.1	-0.2	-0.2	0.3	1.4	0.6
850	-0.5	-0.2	-0.1	0.1	0.0	-0.1	-0.2	0.3	1.2	0.5
1000	-0.4	-0.2	-0.0	0.1	0.0	-0.1	-0.2	0.3	1.0	0.4

TABLE 16b NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE FEBRUARY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	11.5	9.4	7.7	20.0	48.8	73.2	83.0	51.1	-3.4	-5.1
1	7.4	6.3	6.5	16.4	39.5	62.7	81.1	46.0	-6.3	-5.8
2	2.5	3.3	4.9	13.6	33.0	54.3	77.2	37.7	-11.9	-7.7
5	-2.1	1.1	2.8	9.0	20.3	35.3	56.0	19.4	-21.4	-9.8
10	-3.1	0.6	1.5	5.3	11.2	21.8	36.6	7.7	-19.6	-7.3
30	-3.2	0.2	0.4	1.4	2.9	7.6	12.1	-1.0	-9.0	-2.6
50	-3.4	0.1	0.3	0.7	1.4	4.0	5.7	-2.2	-5.8	-1.3
70	-3.7	-0.1	0.4	0.6	0.9	2.6	3.5	-1.8	-4.1	-0.3
100	-3.4	-0.5	0.4	0.8	0.8	1.9	2.5	-0.9	-3.1	-0.0
150	-1.9	-0.4	0.4	1.3	1.0	1.9	2.1	-0.4	-2.1	0.3
200	-1.1	-0.2	0.5	1.6	1.4	2.2	2.2	-0.3	-1.5	0.7
250	-0.7	-0.1	0.5	1.6	1.6	2.5	2.4	-0.4	-1.6	0.7
300	-0.5	-0.0	0.5	1.5	1.5	2.6	2.4	-0.5	-1.7	0.6
400	-0.5	0.0	0.6	1.1	1.1	2.2	1.8	-0.9	-1.5	0.6
500	-0.6	0.0	0.5	0.8	0.8	1.6	1.2	-1.2	-1.2	0.6
700	-0.7	0.1	0.2	0.4	0.3	0.8	0.3	-1.5	-1.0	0.3
850	-0.5	0.1	0.1	0.2	0.2	0.3	-0.2	-1.5	-0.8	0.1
1000	-0.0	0.2	0.1	0.1	0.2	0.0	-0.8	-1.3	-0.5	0.1

TABLE 16d NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE APRIL

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-5.1	1.7	1.2	1.0	3.1	5.2	6.9	11.5	19.7	6.7
1	-4.0	0.9	1.0	0.8	2.9	5.0	7.1	8.2	13.7	6.5
2	-1.8	0.6	0.9	0.9	2.9	4.8	7.0	5.4	8.4	5.1
5	-0.3	-0.0	0.4	0.5	2.0	3.3	5.5	2.8	4.3	3.0
10	-0.1	-0.2	0.2	0.3	1.0	1.7	4.2	2.0	2.2	1.5
30	-0.1	-0.2	0.1	0.1	0.4	1.0	2.9	0.5	-0.1	0.2
50	-0.3	-0.3	0.0	0.0	0.4	1.1	2.5	-0.3	-0.9	-0.3
70	-0.5	-0.3	0.0	0.0	0.4	1.2	2.2	-0.8	-1.2	-0.6
100	-0.6	-0.2	-0.0	-0.0	0.3	1.3	1.9	-1.3	-1.4	-0.8
150	-0.7	-0.2	-0.1	-0.1	0.2	1.3	1.5	-1.8	-1.0	-0.7
200	-0.5	-0.2	-0.1	-0.1	0.1	1.3	1.1	-1.9	-0.1	-0.2
250	-0.3	-0.1	-0.1	-0.1	0.3	1.2	0.9	-1.7	1.2	0.4
300	-0.3	0.0	-0.0	-0.0	0.4	1.1	0.7	-1.4	2.4	0.8
400	-0.2	0.1	0.0	0.1	0.4	0.7	0.3	-0.8	3.2	1.1
500	-0.2	0.0	0.0	0.1	0.3	0.4	0.1	-0.4	2.7	0.9
700	-0.3	-0.1	-0.0	0.1	0.1	0.0	0.0	-0.0	1.6	0.4
850	-0.4	-0.2	0.1	0.1	0.1	-0.1	0.1	0.0	1.0	0.2
1000	-0.8	-0.2	-0.0	0.1	0.1	-0.2	0.2	0.0	0.3	0.0

TABLE 16f NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE JUNE

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-6.5	0.4	-1.0	-0.1	-0.6	-0.1	1.0	0.8	0.4	-0.5
1	-2.7	0.8	-0.8	-0.2	-0.5	-0.3	0.7	0.4	0.1	-0.5
2	-0.6	0.8	-0.5	-0.2	-0.4	-0.4	0.5	0.0	-0.2	-0.5
5	0.7	0.4	-0.2	-0.1	-0.4	-0.3	0.5	-0.3	-0.5	-0.6
10	0.5	0.1	-0.2	-0.0	-0.3	-0.2	0.5	-0.3	-0.3	-0.4
30	0.4	0.1	-0.1	-0.0	-0.1	-0.1	0.2	0.1	0.3	-0.0
50	0.5	0.2	-0.0	0.0	-0.0	0.0	0.2	0.1	0.4	0.1
70	0.5	0.2	0.0	0.1	-0.0	0.1	0.2	0.0	0.5	0.1
100	0.3	0.3	0.2	0.3	-0.0	0.2	0.3	-0.1	0.4	0.1
150	-0.0	0.2	0.3	0.5	0.1	0.4	0.3	-0.1	-0.0	-0.1
200	-0.3	0.0	0.2	0.5	0.2	0.4	0.4	0.0	-0.3	-0.3
250	-0.4	-0.1	0.1	0.4	0.3	0.4	0.4	0.3	-0.3	-0.2
300	-0.3	-0.1	0.1	0.2	0.3	0.3	0.4	0.5	0.1	0.1
400	-0.4	-0.1	-0.0	0.1	0.1	0.2	0.3	0.6	0.4	0.3
500	-0.5	-0.1	-0.1	0.0	0.0	0.1	0.2	0.4	0.4	0.2
700	-0.5	-0.2	-0.1	0.0	-0.0	-0.0	-0.1	0.3	0.3	0.1
850	-0.4	-0.2	-0.1	0.0	0.1	-0.0	-0.2	0.3	0.3	0.1
1000	-0.4	-0.3	-0.1	0.0	0.2	-0.0	-0.1	0.3	0.2	0.3

TABLE 16g NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE JULY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-10.5	-0.4	-0.4	-0.1	0.1	-0.3	0.3	1.1	-0.0	0.3
1	-6.5	-0.1	-0.3	-0.2	0.1	-0.2	0.2	0.7	-0.2	0.2
2	-3.9	-0.2	-0.2	-0.3	0.2	-0.1	0.0	0.5	-0.2	0.2
5	-0.9	0.0	-0.1	-0.4	0.3	-0.0	-0.2	0.2	-0.2	0.1
10	-0.3	-0.0	-0.1	-0.4	0.2	0.1	-0.1	-0.0	-0.3	-0.0
30	-0.6	-0.2	-0.0	-0.2	0.0	0.1	0.0	-0.1	0.1	-0.0
50	-0.7	-0.2	-0.0	-0.2	-0.0	0.0	0.1	-0.0	0.2	0.1
70	-0.7	-0.2	-0.0	-0.1	-0.1	0.1	0.1	-0.0	0.2	0.0
100	-0.5	-0.0	0.0	-0.1	-0.1	0.2	0.2	0.1	0.2	0.1
150	-0.3	0.0	0.0	0.0	-0.0	0.4	0.5	0.2	0.3	0.4
200	-0.4	-0.0	0.0	0.1	0.2	0.6	0.9	0.3	0.3	0.6
250	-0.5	-0.1	0.0	0.1	0.2	0.7	1.1	0.3	0.3	0.9
300	-0.5	-0.1	0.0	0.1	0.2	0.6	1.1	0.3	0.4	1.1
400	-0.4	-0.1	-0.0	0.0	0.1	0.4	0.9	0.0	0.5	1.2
500	-0.4	-0.2	-0.0	-0.0	0.0	0.3	0.6	-0.2	0.3	1.0
700	-0.6	-0.3	-0.0	-0.0	-0.1	0.1	0.3	-0.5	0.1	0.6
850	-0.7	-0.3	-0.0	-0.0	-0.1	0.1	0.1	-0.6	0.1	0.4
1000	-0.6	-0.3	-0.0	-0.0	-0.1	0.0	-0.1	-0.5	0.1	0.3

TABLE 16k NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE AUGUST

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-4.4	-3.9	-0.7	0.4	-0.2	-0.2	1.1	2.1	1.5	1.5
1	-2.5	-2.6	-0.6	0.2	-0.3	-0.3	0.5	1.4	1.1	1.3
2	-1.2	-1.7	-0.4	0.0	-0.3	-0.3	0.0	1.1	0.8	1.1
5	-0.3	-0.7	-0.2	0.0	-0.3	-0.2	-0.1	1.0	0.5	0.9
10	-0.3	-0.4	-0.1	0.1	-0.3	-0.1	-0.1	1.0	0.3	0.5
30	-0.0	-0.2	-0.0	0.1	-0.1	-0.1	0.2	0.7	0.2	0.0
50	0.3	-0.1	0.0	0.1	-0.0	-0.2	0.2	0.5	0.2	-0.1
70	0.3	-0.0	0.0	0.1	0.0	-0.2	0.2	0.5	0.3	-0.1
100	0.1	0.1	0.1	0.1	0.2	-0.2	0.3	0.6	0.5	-0.1
150	-0.6	0.1	0.0	-0.1	0.4	-0.3	0.3	1.0	0.8	0.1
200	-0.7	0.0	0.0	-0.1	0.3	-0.3	0.3	1.3	1.3	0.5
250	-0.3	0.1	0.1	0.0	0.1	-0.4	0.4	1.4	2.0	1.0
300	0.0	0.2	0.1	0.0	-0.0	-0.4	0.3	1.4	2.7	1.3
400	0.1	0.0	0.0	0.0	-0.1	-0.4	0.2	1.1	3.2	1.5
500	-0.2	-0.2	-0.1	-0.0	-0.1	-0.3	0.1	0.8	3.0	1.6
700	-0.9	-0.4	-0.2	-0.0	-0.1	-0.1	-0.0	0.5	2.5	1.6
850	-1.1	-0.5	-0.2	-0.1	-0.0	-0.2	-0.1	0.3	1.9	1.4
1000	-0.9	-0.6	-0.2	-0.1	-0.0	-0.1	-0.0	0.4	1.4	1.2

TABLE 16i NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE SEPTEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-7.1	-2.8	-1.9	-0.5	0.1	2.3	3.7	4.6	4.2	2.8
1	-3.5	-1.6	-1.1	-0.1	0.1	1.5	2.6	2.7	2.7	2.1
2	-1.4	-0.9	-0.4	-0.0	0.2	1.0	2.2	1.6	1.9	1.7
5	0.2	-0.3	0.0	0.1	0.6	0.5	1.6	0.9	1.2	1.2
10	0.3	-0.2	0.0	0.1	0.6	0.4	1.0	0.6	0.7	0.8
30	0.2	-0.1	-0.1	-0.0	0.1	0.2	0.3	0.4	0.1	0.2
50	0.3	-0.1	-0.0	-0.0	0.1	0.1	0.2	0.3	-0.2	-0.0
70	0.2	-0.1	-0.0	0.0	0.1	0.1	0.1	0.3	-0.4	-0.1
100	-0.3	-0.3	0.0	0.2	0.4	0.1	0.1	0.2	-0.5	-0.2
150	-0.8	-0.5	0.1	0.4	0.8	0.2	0.1	0.1	-0.6	-0.2
200	-0.7	-0.4	0.1	0.5	0.8	0.2	0.2	-0.2	-0.7	-0.4
250	-0.5	-0.2	0.0	0.4	0.7	0.2	0.1	-0.6	-0.9	-0.5
300	-0.3	-0.1	0.0	0.3	0.5	0.3	0.1	-0.7	-1.0	-0.4
400	-0.4	-0.1	0.0	0.1	0.2	0.3	0.0	-0.6	-0.7	-0.1
500	-0.5	-0.2	0.0	0.0	0.1	0.2	0.0	-0.4	-0.3	0.1
700	-0.7	-0.3	0.0	-0.0	0.0	0.1	-0.0	-0.1	0.2	0.3
850	-0.7	-0.4	-0.0	0.0	0.0	-0.0	-0.1	0.0	0.4	0.4
1000	-0.7	-0.3	-0.0	0.0	0.0	-0.1	-0.2	0.1	0.5	0.6

TABLE 16j NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE OCTOBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-1.5	5.2	4.5	10.5	24.3	45.0	40.7	44.0	11.7	1.1
1	-2.3	3.7	3.5	7.8	17.9	32.0	28.6	29.7	8.2	1.6
2	-2.9	2.3	2.5	5.1	12.1	21.1	18.9	20.0	5.5	1.5
5	-2.9	0.2	1.0	1.6	4.2	7.9	8.6	10.8	4.0	1.4
10	-2.4	-0.2	0.3	0.1	1.1	2.7	4.3	5.7	2.9	1.0
30	-1.9	-0.1	0.2	-0.1	0.4	0.6	1.1	0.7	0.7	0.2
50	-1.9	-0.2	0.3	-0.0	0.4	0.3	0.4	-0.2	0.1	-0.0
70	-2.0	-0.3	0.4	0.1	0.6	0.3	0.2	-0.4	-0.2	-0.2
100	-1.4	-0.4	0.5	0.2	0.9	0.3	0.2	-0.6	-0.5	-0.2
150	-0.7	-0.5	0.3	0.4	1.0	0.3	0.4	-0.8	-0.8	-0.1
200	-0.2	-0.5	0.3	0.4	0.8	0.4	0.6	-1.0	-0.8	0.1
250	-0.1	-0.3	0.3	0.4	0.7	0.5	0.8	-1.3	-0.6	0.3
300	-0.1	-0.2	0.2	0.3	0.6	0.5	0.8	-1.6	-0.7	0.0
400	-0.4	-0.1	0.2	0.2	0.4	0.3	0.6	-1.4	-1.0	-0.6
500	-0.4	-0.0	0.1	0.1	0.3	0.2	0.5	-1.0	-1.1	-0.6
700	-0.5	-0.1	0.0	0.1	0.1	0.1	0.2	-0.4	-0.6	-0.4
850	-0.5	-0.2	-0.0	0.1	-0.0	0.0	0.2	-0.3	0.0	0.0
1000	-0.5	-0.2	-0.0	0.1	0.0	-0.0	0.3	-0.2	0.7	0.6

TABLE 16k NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE NOVEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	3.3	3.7	-0.6	3.8	9.9	14.5	11.4	12.5	-1.2	2.5
1	1.9	2.3	0.2	3.5	7.8	15.6	15.9	16.0	-4.2	0.3
2	0.3	1.2	0.9	4.6	7.9	17.5	20.8	20.6	-7.0	-2.1
5	-1.5	-0.0	0.8	4.5	7.6	16.3	20.6	15.8	-11.8	-5.4
10	-1.7	-0.4	0.2	2.7	4.5	10.1	13.4	8.4	-11.3	-5.9
30	-1.5	-0.3	-0.0	0.6	0.7	1.5	2.5	1.2	-6.2	-4.2
50	-1.5	-0.3	0.1	0.3	0.3	0.1	0.0	-0.5	-4.4	-3.2
70	-1.6	-0.3	0.1	0.3	0.2	-0.1	-0.6	-0.9	-3.3	-2.5
100	-1.1	-0.3	0.1	0.4	0.3	0.1	-0.8	-1.2	-2.2	-1.5
150	-0.6	-0.2	0.0	0.5	0.5	0.5	-0.9	-1.4	-1.3	-0.7
200	-0.5	-0.2	0.0	0.4	0.4	0.8	-1.1	-1.4	-1.1	-0.5
250	-0.3	-0.1	0.0	0.4	0.3	0.8	-1.3	-1.4	-0.8	-0.5
300	-0.1	-0.1	0.1	0.3	0.2	0.7	-1.4	-1.2	-0.6	-0.4
400	-0.0	0.0	0.1	0.1	0.1	0.5	-1.2	-0.9	-0.5	-0.2
500	-0.1	-0.0	0.1	0.1	-0.0	0.3	-1.0	-0.8	-0.6	-0.2
700	-0.2	-0.1	0.0	0.1	-0.1	0.2	-0.5	-0.6	-0.8	-0.3
850	-0.4	-0.1	0.0	0.1	-0.1	-0.0	-0.3	-0.5	-0.8	-0.4
1000	-0.6	-0.1	0.0	0.1	-0.0	-0.2	-0.2	-0.5	-0.7	-0.7

TABLE 16l NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 1 FOR 4-YEAR (1979-1982) AVERAGE DECEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	4.7	1.2	2.1	7.6	23.3	27.6	16.9	6.7	-1.9	0.7
1	2.7	0.7	2.6	7.6	19.3	26.7	17.0	3.7	-5.5	0.7
2	1.3	0.7	2.7	7.0	14.8	22.9	16.1	1.2	-8.4	0.0
5	0.8	0.2	2.1	4.8	6.9	10.6	10.6	-1.9	-10.9	-0.8
10	0.9	0.1	1.2	2.8	2.7	4.7	7.6	-3.4	-12.2	-1.9
30	0.8	0.0	0.3	0.6	0.8	2.5	3.9	-4.5	-10.0	-2.2
50	0.6	-0.0	0.1	0.2	0.7	1.8	1.6	-4.1	-6.3	-2.1
70	0.4	-0.1	0.1	0.3	0.8	1.4	0.7	-3.6	-7.1	-1.9
100	0.1	-0.1	0.1	0.6	1.1	1.3	0.3	-3.3	-5.9	-1.3
150	0.4	0.2	0.3	0.9	1.4	1.4	0.2	-3.1	-4.4	-0.2
200	0.6	0.3	0.4	0.8	1.5	1.5	0.3	-2.8	-3.4	0.7
250	0.7	0.3	0.3	0.8	1.3	1.6	0.5	-2.5	-2.6	1.4
300	0.5	0.3	0.3	0.7	1.1	1.6	0.7	-2.1	-2.1	1.8
400	0.0	0.1	0.3	0.4	0.8	1.4	0.9	-1.2	-1.9	1.7
500	-0.4	-0.0	0.2	0.1	0.5	1.1	1.0	-0.5	-1.7	0.9
700	-0.8	-0.1	0.1	-0.1	0.1	0.7	0.8	0.3	-0.8	0.1
850	-0.8	-0.1	0.1	-0.1	-0.0	0.5	0.6	0.5	-0.0	-0.1
1000	-0.5	-0.1	0.0	-0.1	-0.1	0.5	0.4	0.7	0.6	-0.3

TABLE 17a NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE JANUARY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-33.0	3.2	4.1	24.0	64.7	58.8	56.2	29.5	6.1	1.6
1	-17.7	3.1	2.2	15.3	40.6	41.2	47.4	24.4	8.2	2.0
2	-5.7	2.0	0.5	9.8	25.5	29.6	38.4	20.4	10.4	2.3
5	2.2	1.7	-0.1	4.9	12.0	16.5	23.4	10.1	8.0	1.8
10	2.0	0.5	0.3	3.0	6.1	12.3	17.6	6.5	5.1	1.5
30	2.4	0.4	0.4	0.7	1.2	6.0	8.4	2.4	2.4	0.9
50	2.3	0.2	0.4	0.4	0.6	3.8	3.8	-0.3	1.3	0.7
70	2.3	0.1	0.5	0.5	0.8	3.3	2.0	-1.2	1.0	0.6
100	0.0	-0.3	0.8	0.9	1.4	3.2	0.9	-1.6	0.8	0.5
150	-1.5	-0.6	1.1	1.6	2.3	3.4	0.1	-1.8	0.6	0.3
200	-1.3	-0.3	1.1	2.2	3.2	4.2	-0.1	-2.5	0.4	0.2
250	-1.1	-0.1	1.0	2.5	3.7	4.9	-0.0	-3.4	0.2	0.2
300	-0.8	-0.0	1.0	2.5	3.8	5.0	0.1	-3.7	0.0	0.2
400	-0.8	-0.1	0.8	2.2	3.3	4.0	0.2	-3.4	0.0	0.2
500	-0.9	-0.1	0.7	1.8	2.5	2.7	0.3	-2.8	0.2	0.3
700	-1.0	-0.1	0.4	1.1	1.4	1.2	0.3	-1.7	0.1	0.1
850	-0.7	-0.1	0.3	0.8	1.2	0.5	0.2	-1.0	0.0	0.0
1000	-0.2	-0.1	0.1	0.8	1.3	-0.2	-0.0	-0.5	0.1	-0.0

TABLE 17b NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE FEBRUARY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	8.6	1.9	9.8	31.4	63.0	79.0	64.8	12.5	9.2	1.8
1	3.9	0.5	5.7	19.8	44.4	62.0	56.6	11.3	12.2	2.5
2	-1.4	-1.0	2.7	10.8	29.7	49.0	50.4	10.3	13.6	2.8
5	-3.5	-0.4	1.5	4.9	15.9	30.9	38.1	5.6	10.0	2.1
10	-3.1	0.2	1.6	3.6	9.1	20.5	25.1	-1.2	4.3	1.2
30	-3.0	-0.7	0.9	1.6	2.5	8.0	10.8	-3.9	-2.2	0.1
50	-3.3	-1.2	0.7	1.4	1.9	4.3	7.3	-1.5	-2.7	-0.1
70	-3.5	-1.3	0.6	2.0	2.3	3.1	5.1	-0.5	-2.4	-0.1
100	-2.8	-1.1	0.8	3.3	3.0	2.5	3.2	-0.1	-2.1	-0.1
150	-1.7	-0.6	1.4	4.7	4.0	2.3	1.6	0.0	-1.6	-0.0
200	-1.3	-0.2	1.4	5.1	4.5	2.2	0.9	-0.3	-0.7	0.2
250	-0.8	0.1	1.5	4.8	4.3	2.0	0.4	-0.7	0.2	0.3
300	-0.3	0.4	1.5	4.2	3.9	1.9	0.2	-0.7	0.7	0.5
400	0.0	0.6	1.4	3.0	3.0	1.9	0.2	-0.4	1.0	0.6
500	-0.1	0.5	1.2	2.1	2.3	1.9	0.4	-0.4	1.0	0.5
700	-0.1	0.2	0.6	0.9	1.4	1.5	0.6	-0.5	0.7	0.3
850	0.0	0.0	0.3	0.3	0.9	1.1	0.4	-0.5	0.5	0.1
1000	-0.1	-0.0	0.1	0.0	0.8	0.6	0.2	-0.2	0.4	0.0

TABLE 17c NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE MARCH

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	8.0	7.2	5.2	4.9	9.2	7.3	12.3	3.3	-1.3	0.2
1	5.5	5.3	4.3	4.3	8.6	9.1	14.1	2.9	-0.0	0.4
2	2.5	4.0	3.6	3.6	9.5	14.7	20.1	5.6	1.4	0.3
5	-2.6	1.9	2.8	2.5	8.5	19.0	27.1	8.4	2.5	-0.1
10	-5.4	1.0	1.7	1.1	4.8	15.4	23.0	8.0	2.6	-0.1
30	-6.1	0.3	0.3	0.1	1.1	5.2	7.8	2.3	3.0	0.3
50	-6.8	-0.1	-0.1	0.1	0.9	2.8	3.4	0.5	2.5	0.4
70	-7.4	-0.4	-0.2	0.2	1.3	2.2	1.8	-0.2	1.9	0.4
100	-6.2	0.0	0.1	1.0	2.1	2.0	0.9	-0.5	1.2	0.3
150	-2.9	0.5	0.7	2.4	2.9	2.2	0.5	-0.8	0.1	0.0
200	-2.0	0.4	0.9	3.1	3.3	2.6	0.4	-1.0	-0.7	-0.1
250	-1.5	0.3	0.9	2.9	3.2	2.8	0.4	-1.3	-1.1	-0.2
300	-1.0	0.2	0.8	2.3	2.9	2.6	0.4	-1.4	-1.2	-0.2
400	-0.6	0.1	0.6	1.4	2.3	2.1	0.4	-1.2	-1.1	-0.2
500	-0.6	-0.1	0.4	0.9	1.8	1.7	0.5	-0.4	-0.8	-0.1
700	-0.5	-0.0	0.2	0.3	0.8	1.2	0.6	-0.3	-0.6	-0.0
850	-0.3	0.1	0.1	0.2	0.6	0.8	0.6	-0.0	-0.5	-0.0
1000	0.3	-0.0	0.0	0.1	0.5	0.5	0.7	0.2	-0.4	-0.0

TABLE 17d NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE APRIL

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-2.6	3.6	1.7	2.7	2.1	1.8	2.3	-3.0	-13.0	-7.0
1	-1.0	3.1	1.4	1.9	1.7	1.6	2.0	-2.0	-7.4	-3.8
2	-0.3	2.3	1.0	1.5	2.2	2.5	3.1	-1.0	-3.4	-1.5
5	0.4	1.5	-0.0	1.4	3.5	5.1	5.9	0.4	-1.1	-0.1
10	1.1	1.5	-0.4	1.3	3.2	5.8	6.5	1.0	-0.6	0.1
30	1.5	1.2	-0.2	0.7	1.3	2.6	2.7	-0.4	-0.3	-0.0
50	1.1	0.7	0.2	0.6	0.4	1.1	0.1	-1.2	-0.2	-0.1
70	0.8	0.5	0.4	0.8	0.5	0.8	-1.1	-1.3	-0.3	-0.2
100	0.9	0.3	0.6	1.4	0.9	0.6	-1.6	-1.5	-0.4	-0.3
150	0.6	0.3	1.0	1.9	1.5	1.1	-2.3	-1.6	-0.3	-0.4
200	0.2	0.0	1.0	1.8	1.8	1.6	-2.7	-1.6	-0.3	-0.5
250	0.1	-0.0	0.8	1.4	1.8	2.0	-3.0	-1.7	-0.3	-0.5
300	0.2	0.0	0.5	1.1	1.6	2.0	-3.0	-1.7	-0.3	-0.5
400	0.2	0.0	0.3	0.7	1.2	1.6	-2.2	-1.2	-0.2	-0.4
500	0.2	-0.0	0.2	0.5	0.9	1.1	-1.3	-0.6	0.1	-0.2
700	0.3	0.0	0.1	0.3	0.4	0.4	-0.4	-0.2	0.3	0.1
850	0.2	0.0	0.0	0.2	0.2	0.0	-0.2	-0.0	0.1	0.1
1000	-0.1	0.1	0.1	0.1	0.3	-0.2	0.1	0.2	-0.1	0.0

TABLE 17e NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE MAY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	-1.5	0.9	0.1	-1.4	-0.5	0.0	0.6	-0.8	0.1	0.0
1	-1.2	0.9	0.3	-1.2	-0.3	-0.2	0.4	-0.9	-0.1	-0.0
2	-0.2	1.1	0.3	-0.9	0.1	-0.1	0.3	-1.0	-0.2	-0.0
5	-0.2	0.9	0.3	-0.5	0.5	0.2	0.4	-0.9	-0.2	-0.0
10	-0.5	0.8	0.2	-0.4	0.5	0.4	0.6	-0.5	-0.2	-0.0
30	-0.2	0.8	-0.0	-0.1	0.3	0.3	0.6	-0.3	-0.1	-0.0
50	0.0	0.8	-0.1	-0.0	0.3	0.2	0.4	-0.3	-0.1	-0.0
70	0.2	0.8	-0.1	0.3	0.4	0.2	0.3	-0.3	-0.0	-0.0
100	0.4	0.6	0.3	1.0	0.8	0.2	0.3	-0.3	0.0	-0.0
150	0.2	0.3	0.7	1.8	1.5	0.2	0.3	-0.1	0.3	0.0
200	-0.4	0.1	0.7	1.8	1.8	0.3	0.4	0.3	0.7	0.1
250	-0.4	0.0	0.6	1.6	1.6	0.3	0.5	0.6	1.4	0.3
300	-0.5	-0.0	0.5	1.1	1.4	0.3	0.7	1.1	2.1	0.4
400	-0.4	-0.0	0.3	0.6	0.8	0.3	0.6	1.1	2.3	0.4
500	-0.3	-0.0	0.2	0.3	0.4	0.3	0.4	0.9	1.7	0.3
700	-0.3	0.0	0.1	0.2	0.1	0.1	-0.1	0.5	0.5	0.1
850	-0.3	0.0	0.0	0.1	0.0	0.0	-0.2	0.4	-0.0	-0.0
1000	-0.4	-0.1	0.1	0.1	0.2	0.0	-0.0	0.4	-0.4	-0.1

TABLE 17f NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^3) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE JUNE

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	1.2	0.7	-0.0	0.1	-0.1	-0.4	0.0	0.2	0.2	0.2
1	1.3	0.7	-0.0	0.1	-0.0	-0.4	-0.0	0.2	0.2	0.2
2	1.7	0.7	0.0	0.0	0.1	-0.4	-0.1	0.3	0.3	0.2
5	1.2	0.7	0.0	0.1	0.1	-0.3	-0.1	0.3	0.3	0.2
10	0.7	0.7	0.0	0.0	0.1	-0.2	-0.1	0.2	0.1	0.1
30	0.6	0.7	0.2	-0.1	0.1	0.0	0.1	0.2	-0.2	0.0
50	0.2	0.6	0.3	0.1	0.3	0.1	0.1	0.2	-0.3	-0.1
70	-0.3	0.4	0.4	0.4	0.5	0.2	0.1	0.2	-0.3	-0.1
100	-0.3	0.3	0.5	0.9	1.0	0.3	0.1	0.1	-0.3	-0.1
150	0.0	0.2	0.5	1.6	2.0	0.5	-0.1	-0.2	-0.1	-0.0
200	0.2	0.1	0.4	1.6	2.6	0.7	-0.4	-0.7	0.3	0.1
250	0.4	0.0	0.2	1.2	2.4	0.6	-0.7	-1.1	0.8	0.2
300	0.6	0.0	0.1	0.7	1.9	0.5	-0.8	-1.1	1.2	0.3
400	0.5	-0.0	0.1	0.2	1.0	0.4	-0.8	-0.8	1.4	0.3
500	0.2	-0.0	0.0	0.0	0.4	0.3	-0.7	-0.5	1.3	0.2
700	-0.1	0.0	-0.0	-0.1	-0.1	0.1	-0.4	-0.2	0.6	0.2
850	-0.1	0.1	-0.1	-0.0	-0.2	-0.1	-0.2	-0.1	0.2	0.1
1000	-0.1	0.1	-0.1	-0.0	-0.1	-0.1	0.0	0.0	0.1	0.0

TABLE 17g NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE JULY

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	0.4	1.3	0.0	-0.0	-0.1	-0.1	0.1	0.3	0.6	0.4
1	5.6	1.2	0.1	-0.0	-0.0	-0.1	0.1	0.3	0.5	0.3
2	3.6	0.8	0.1	-0.1	0.0	-0.0	0.0	0.4	0.4	0.2
5	2.7	0.9	0.2	-0.1	0.1	-0.1	-0.0	0.4	0.4	0.2
10	2.8	0.9	0.1	0.0	0.1	0.1	-0.0	0.1	0.2	0.1
30	2.7	0.5	-0.1	0.1	0.2	0.2	0.0	-0.1	0.1	0.1
50	2.6	0.3	-0.2	0.1	0.2	0.3	0.2	-0.0	0.0	0.1
70	2.3	0.0	-0.3	0.1	0.3	0.3	0.4	0.0	-0.1	0.0
100	0.8	-0.2	-0.3	0.1	0.5	0.5	0.5	-0.0	-0.2	-0.0
150	-1.0	-0.3	-0.1	0.2	0.8	0.9	0.6	-0.4	-0.3	-0.1
200	-1.0	-0.1	-0.1	0.1	0.7	1.3	0.5	-1.0	-0.0	0.0
250	-0.5	-0.0	-0.0	0.1	0.5	1.3	0.1	-1.5	0.5	0.2
300	-0.2	0.0	-0.0	0.1	0.4	1.0	-0.2	-1.7	0.8	0.2
400	-0.1	0.0	-0.1	0.1	0.2	0.4	-0.3	-1.3	0.9	0.2
500	-0.2	-0.0	-0.1	0.1	0.1	0.0	-0.2	-0.8	0.7	0.2
700	-0.2	-0.0	-0.1	0.0	-0.0	-0.3	-0.1	-0.3	0.3	0.1
850	-0.2	-0.0	-0.1	0.0	-0.0	-0.3	0.0	-0.1	-0.0	0.0
1000	-0.1	-0.0	0.0	0.0	0.0	-0.1	0.2	0.2	-0.2	-0.0

TABLE 17h NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE AUGUST

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	1.7	-1.6	0.4	0.3	0.1	-0.6	-0.4	0.2	-0.5	-0.1
1	0.8	-1.3	0.5	0.1	0.1	-0.5	-0.3	0.3	-0.4	-0.1
2	-0.2	-1.2	0.6	0.1	0.1	-0.4	-0.3	0.5	-0.2	-0.1
5	-1.8	-1.4	0.5	-0.0	0.1	-0.2	-0.2	0.6	-0.0	-0.0
10	-2.2	-1.4	0.3	0.0	0.2	0.1	-0.1	0.3	-0.0	-0.0
30	-1.9	-1.2	0.0	-0.0	0.1	0.3	-0.2	0.1	0.2	0.0
50	-1.5	-0.9	0.0	-0.1	0.1	0.4	-0.3	0.1	0.3	0.0
70	-1.4	-0.7	0.1	-0.2	0.3	0.6	-0.4	0.0	0.4	0.0
100	-1.2	-0.6	0.0	-0.1	0.7	1.0	-0.5	-0.3	0.5	0.0
150	-1.1	-0.6	-0.1	0.1	1.2	1.6	-1.1	-1.4	0.5	0.0
200	-0.7	-0.5	-0.1	0.3	1.3	1.5	-1.9	-2.8	0.4	0.0
250	-0.3	-0.3	-0.1	0.4	1.2	1.0	-2.4	-4.0	0.1	0.0
300	-0.1	-0.2	-0.1	0.4	0.9	0.6	-2.4	-4.3	-0.3	-0.0
400	-0.0	-0.1	-0.1	0.3	0.4	0.2	-1.9	-3.4	-0.5	-0.0
500	0.0	-0.0	-0.1	0.2	0.2	0.0	-1.4	-2.4	-0.4	-0.0
700	0.2	0.0	-0.1	0.1	-0.0	-0.1	-0.7	-1.1	-0.1	0.0
850	0.0	-0.0	-0.0	0.0	0.0	-0.1	-0.4	-0.6	-0.2	0.0
1000	-0.1	-0.0	0.0	0.0	0.1	-0.1	-0.2	-0.4	-0.5	-0.1

TABLE 17i NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE SEPTEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	2.5	-0.4	-1.1	-0.5	0.3	2.1	2.9	2.5	0.2	-0.1
1	0.6	-0.3	-0.7	-0.3	0.1	1.4	2.0	1.7	0.0	-0.0
2	-0.1	0.1	-0.3	-0.1	0.0	1.0	1.9	1.2	-0.0	-0.0
5	-0.6	-0.2	0.1	0.0	-0.0	0.6	1.9	0.8	0.1	-0.1
10	-0.4	-0.3	0.2	0.1	-0.1	0.5	1.3	0.4	-0.0	-0.1
30	0.2	-0.1	0.3	0.1	0.1	0.1	0.2	-0.1	-0.1	-0.0
50	0.3	-0.0	0.2	0.2	0.2	0.0	-0.3	-0.3	-0.1	-0.0
70	0.3	0.0	0.1	0.2	0.2	0.1	-0.3	-0.2	-0.2	-0.0
100	0.3	0.2	0.2	0.3	0.3	0.3	-0.1	-0.1	-0.3	-0.1
150	-0.4	0.1	0.3	0.5	0.4	0.3	0.5	-0.1	-0.5	-0.0
200	-0.5	0.0	0.2	0.5	0.5	0.1	0.9	-0.4	-0.4	0.1
250	-0.2	0.0	0.1	0.4	0.6	0.1	1.0	-0.8	-0.1	0.2
300	-0.0	0.0	0.1	0.3	0.6	0.1	0.8	-0.9	0.1	0.2
400	-0.1	-0.0	0.0	0.2	0.6	0.2	0.3	-0.8	0.2	0.2
500	-0.2	-0.1	0.0	0.1	0.5	0.3	-0.1	-0.6	0.2	0.1
700	-0.1	-0.0	0.0	0.1	0.2	0.1	-0.3	-0.4	0.2	0.1
850	-0.1	0.0	0.0	0.1	0.1	-0.0	-0.3	-0.3	0.3	0.1
1000	-0.0	0.1	0.1	0.1	0.1	-0.0	-0.3	-0.2	0.4	0.1

TABLE 17j NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE OCTOBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	1.4	-1.3	-1.3	1.7	3.4	6.4	7.1	2.7	1.8	0.9
1	0.5	-1.0	-1.0	1.5	3.5	6.2	5.2	1.2	1.3	0.7
2	0.5	-0.8	-0.5	1.4	3.4	6.6	5.5	1.3	1.3	0.7
5	0.7	-0.3	-0.1	0.9	2.8	6.0	6.8	2.0	1.2	0.6
10	1.0	-0.2	0.0	0.5	1.8	4.1	5.5	1.7	0.8	0.4
30	1.2	-0.5	0.1	0.2	0.7	1.0	1.3	0.3	-0.0	0.2
50	1.2	-0.7	0.2	0.2	0.6	0.2	0.1	-0.2	-0.1	0.2
70	1.1	-0.8	0.3	0.4	0.8	0.0	-0.4	-0.5	-0.1	0.2
100	1.0	-0.7	0.3	0.8	1.0	0.1	-0.6	-0.8	-0.0	0.2
150	0.8	-0.1	0.2	1.3	1.1	0.6	-0.5	-1.3	0.1	0.1
200	0.1	-0.2	0.1	1.2	1.0	1.3	-0.5	-2.0	0.4	0.2
250	-0.3	-0.4	0.1	0.9	0.9	1.8	-0.4	-2.5	0.5	0.2
300	-0.3	-0.3	0.1	0.5	0.8	2.0	-0.3	-2.7	0.6	0.2
400	-0.3	-0.3	0.1	0.2	0.6	1.8	-0.0	-2.1	0.8	0.3
500	-0.4	-0.3	0.0	0.2	0.5	1.4	0.1	-1.5	0.8	0.2
700	-0.3	-0.1	-0.0	0.2	0.3	0.8	0.2	-0.9	0.5	0.1
850	-0.2	-0.0	-0.0	0.2	0.2	0.4	0.2	-0.7	0.3	0.1
1000	-0.3	-0.0	0.0	0.2	0.3	0.1	0.3	-0.5	0.4	0.1

TABLE 17k NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1979-1982) AVERAGE NOVEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	3.3	2.3	1.5	8.1	12.8	8.2	5.2	1.1	0.7	0.3
1	2.6	2.1	1.1	4.8	10.8	8.4	8.3	2.1	0.2	0.0
2	2.3	1.9	0.9	3.7	9.0	8.1	7.0	3.3	0.2	-0.1
5	0.1	1.2	0.7	2.8	6.2	5.6	5.3	3.9	0.7	-0.1
10	-0.8	0.7	0.4	1.4	3.7	3.8	3.3	2.7	1.0	0.0
30	-1.0	0.6	0.1	0.1	0.9	1.1	0.4	0.1	0.9	0.2
50	-0.8	0.7	0.1	0.0	0.3	0.0	-0.6	-0.5	0.5	0.2
70	-0.5	0.9	0.1	0.0	0.1	-0.3	-1.1	-0.8	0.4	0.2
100	-1.1	0.4	0.1	0.2	0.1	-0.5	-1.5	-1.1	0.2	0.2
150	-1.4	-0.2	0.0	0.3	0.6	-0.6	-2.0	-1.2	0.0	0.1
200	-0.9	-0.3	-0.1	0.5	1.1	-0.4	-2.4	-1.3	0.1	0.1
250	-0.5	-0.2	-0.1	0.7	1.4	-0.3	-2.7	-1.3	0.6	0.2
300	-0.3	-0.1	-0.1	0.7	1.4	-0.3	-2.5	-1.1	1.0	0.3
400	-0.1	0.1	0.0	0.4	0.9	-0.4	-1.6	-0.1	1.0	0.3
500	-0.1	0.1	0.1	0.2	0.3	-0.4	-0.8	0.7	0.8	0.2
700	-0.4	0.0	0.1	-0.0	-0.2	-0.1	0.3	1.0	0.7	0.2
850	-0.6	-0.1	0.1	-0.1	-0.2	0.1	0.8	0.9	0.6	0.1
1000	-0.5	-0.1	0.1	-0.1	-0.1	0.4	1.2	0.9	1.0	0.3

TABLE 17l NORTHWARD FLUX OF EASTWARD MOMENTUM (M^2/S^2) BY THE TRANSIENT EDDIES OF THE ZONAL WAVE NUMBER 2 FOR 4-YEAR (1978-1981) AVERAGE DECEMBER

PRESSURE (MB)	LATITUDE ($^{\circ}$ N)									
	5	10	20	30	40	50	60	70	80	85
0.4	4.8	1.6	2.7	17.1	22.2	10.3	13.8	12.6	4.7	0.4
1	4.8	1.6	2.0	11.4	14.3	8.1	10.9	10.3	4.1	0.3
2	4.3	1.7	1.6	7.2	9.7	7.0	7.7	7.5	3.7	0.3
5	3.5	1.7	0.9	3.8	7.9	5.1	1.2	4.0	3.5	0.3
10	3.4	1.7	0.7	1.9	5.9	2.3	-2.6	2.1	3.1	0.3
30	2.9	1.4	0.4	0.4	1.2	-1.0	-2.7	0.2	2.4	0.3
50	2.1	1.1	0.1	0.3	0.2	-1.2	-2.2	-0.7	2.1	0.4
70	1.8	1.1	-0.1	0.5	0.0	-1.2	-2.3	-1.4	1.9	0.4
100	0.8	0.9	-0.1	0.7	-0.0	-1.2	-3.0	-2.3	1.5	0.4
150	-0.7	0.4	-0.1	0.7	-0.3	-1.4	-4.2	-3.7	1.0	0.2
200	-1.4	0.2	-0.2	0.4	-0.7	-1.8	-5.3	-4.9	1.1	0.2
250	-1.6	0.1	-0.1	0.2	-0.7	-2.1	-6.1	-5.8	1.4	0.2
300	-1.5	0.0	-0.1	0.2	-0.6	-2.1	-6.4	-6.0	1.6	0.2
400	-1.1	-0.0	-0.0	0.2	-0.5	-1.8	-5.5	-5.0	1.5	0.3
500	-0.8	0.0	0.0	0.2	-0.4	-1.4	-4.0	-3.8	1.0	0.2
700	-0.4	0.0	0.1	0.1	-0.3	-0.9	-2.2	-2.2	0.3	0.1
850	0.1	0.1	0.1	0.1	-0.3	-0.8	-1.8	-1.5	-0.1	0.0
1000	0.3	-0.0	0.2	0.1	-0.3	-1.0	-1.8	-0.8	-0.4	-0.1

BIBLIOGRAPHIC DATA SHEET

1. Report No. NASA TM-86182	2. Government Accession No	3. Recipient's Catalog No	
4. Title and Subtitle TROPOSPHERE-STRATOSPHERE (SURFACE-55 KM) MONTHLY GENERAL CIRCULATION STATISTICS FOR THE NORTHERN HEMISPHERE - FOUR YEAR AVERAGES		5. Report Date November 1984	
		6. Performing Organization Code	
7. Author(s) M. F. Wu, M. A. Geller J. G. Olson and M. E. Gelman		8. Performing Organization Report No 19	
9. Performing Organization Name and Address Goddard Space Flight Center Greenbelt, Maryland 20771		10. Work Unit No	
		11. Contract or Grant No	
		13. Type of Report and Period Covered Technical Memorandum	
12. Sponsoring Agency Name and Address National Aeronautics and Space Administration Washington, DC 20546		14. Sponsoring Agency Code	
		15. Supplementary Notes M. F. Wu and M. A. Geller, NASA/Goddard Space Flight Center J. G. Olson, Applied Research Corporation, Landover, MD 20785 M. E. Gelman, National Oceanic and Atmospheric Administration, Washington, DC	
16. Abstract <p>This report presents four year averages of monthly mean Northern Hemisphere general circulation statistics for the period from 1 December 1978 through 30 November 1982. Computations start with daily maps of temperature for 18 pressure levels between 1000 and 0.4 mb that were supplied by NOAA/NMC. Geopotential height and geostrophic wind are constructed using the hydrostatic and geostrophic formulae. Fields presented in this report are zonally averaged temperature, mean zonal wind, and amplitude and phase of the planetary waves in geopotential height with zonal wavenumbers 1-3. The northward fluxes of heat and eastward momentum by the standing and transient eddies along with their wavenumber decomposition and Eliassen-Palm flux propagation vectors and divergences by the standing and transient eddies along with their wavenumber decomposition are also given. Large annual and interannual variations are found in each quantity especially in the stratosphere in accordance with the changes in the planetary wave activity. The results are shown both in graphic and tabular form.</p>			
17. Key Words (Selected by Author(s)) General circulation statistics Atmospheric circulation statistics Meteorological analysis		18. Distribution Statement	
19. Security Classif. (of this report) UNCLASSIFIED	20. Security Classif (of this page) UNCLASSIFIED	21. No of Pages 138	22. Price*

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