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Aerospace  
Remote Sensing

## Early Warning and Crop Condition Assessment

September 1980

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### EROS TO UNIVERSAL TAPE CONVERSION PROCESSOR

S. O. O'Brien

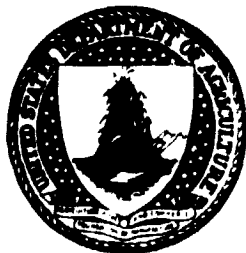
(E81-10074) EROS TO UNIVERSAL TAPE  
CONVERSION PROCESSOR (Lockheed Engineering  
and Management) 11 p HC A02/MF A01 CSCL 05B

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Lockheed Engineering and Management Services Company, Inc.  
Houston, Texas 77058



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Lyndon B. Johnson Space Center  
Houston, Texas 77058

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16. Abstract The function of the EROS processor is to allow a user to select a specific area from a full frame Landsat image which is written on tape in the EROS format. The area of interest is read from the EROS formatted tape and converted to the JSC Universal format and written onto another tape. This tape can then be read by the IMDACS processing system and normal analysis can be performed.					
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EROS TO UNIVERSAL TAPE CONVERSION PROCESSOR

Job Order 73-368

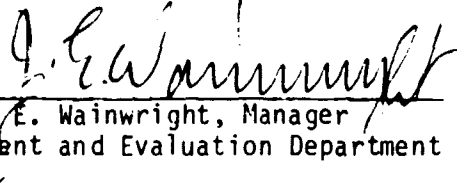
PREPARED BY

S. O. O'Brien

APPROVED BY



J. K. Oney, Project Manager  
Early Warning Project Office



J. E. Wainwright, Manager  
Development and Evaluation Department

LOCKHEED ENGINEERING AND MANAGEMENT SERVICES COMPANY, INC.

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NATIONAL AERONAUTICS AND SPACE ADMINISTRATION  
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HOUSTON, TEXAS

August 1980

LEMSCO-15357

## 1. GENERAL INFORMATION

### 1.1 SYSTEM NAME

EROS

### 1.2 PRIMARY USER

Early Warning Crop Condition Assessment Project personnel.

### 1.3 DEVELOPING ORGANIZATION

Lockheed Engineering and Management Services Company, Inc., S. O. O'Brien.

### 1.4 COMPUTER FACILITY

The EROS Processor runs on a DEC PDP 11/70 computer system under the IAS operating system. It is implemented in the USDA FAS computer facility in Houston, Texas.

### 1.5 REFERENCES

1.5.1 U.S. Government Printing Office Stock Number: 024-001-03116-7  
Manual on Characteristics of Landsat Computer Compatible Tapes  
produced by the EROR Data Center Digital Image Processing System.

1.5.2 DEC-11-LMFUA-B-D Fortran IV User's Guide

1.5.3 DEC-11-LFSMA-A-D RSX-11D Fortran Special Subroutines Reference  
Manual

1.5.4 PHO-TR543 Earth Resources Data Format Control Book, Vol. 1  
Universal Data Tape Format

## 2. DESCRIPTION

### 2.1 PURPOSE

The purpose of the EROS processor is to allow a user to select an area from an EROS generated tape and reformat the data into the JSC Universal Format. The data can then be displayed or loaded by the CCAD image processing system, IMDACS.

### 2.2 USAGE

The EROS processor is set up to run as a batch job. The input will be Band Interleaved, Geometrically Corrected MSS EROS data tapes. The user will input his area of interest and the processor will output a Universal tape file for this area.

### 3. INPUT

#### 3.1 TYPE OF INPUT

##### 3.1.1 TAPE

Band Interleaved, Geometrically Corrected MSS EROS data tape, see 1.5.1.

##### 3.1.2 DISK

None

##### 3.1.3 CARDS

The processor requires the following system control and data cards. See figure 1 for example.

Col. 1

+

```
$JOB ERLYWARN2 EROS 300
```

```
$MOU/FOR/DENSITY:1600 MM: TAPEIN1 XX1:
```

```
$MOU/FOR/DENSITY:1600 MM: TAPEOUT XX2:
```

```
$ASSIGN XX1: 1
```

```
$ASSIGN XX2: 2
```

```
$RUN EROS
```

N = One digit value for file number to write to output  
tape file.

LS = Five digit value for first line in area of interest.

LE = Five digit value for last line in area of interest.

PS = Five digit value for first pixel in area of interest.

PE = Five digit value for last pixel in area of interest.

```
$DISMOUNT XX1:
```

```
$DISMOUNT XX2:
```

```
$EOJ
```

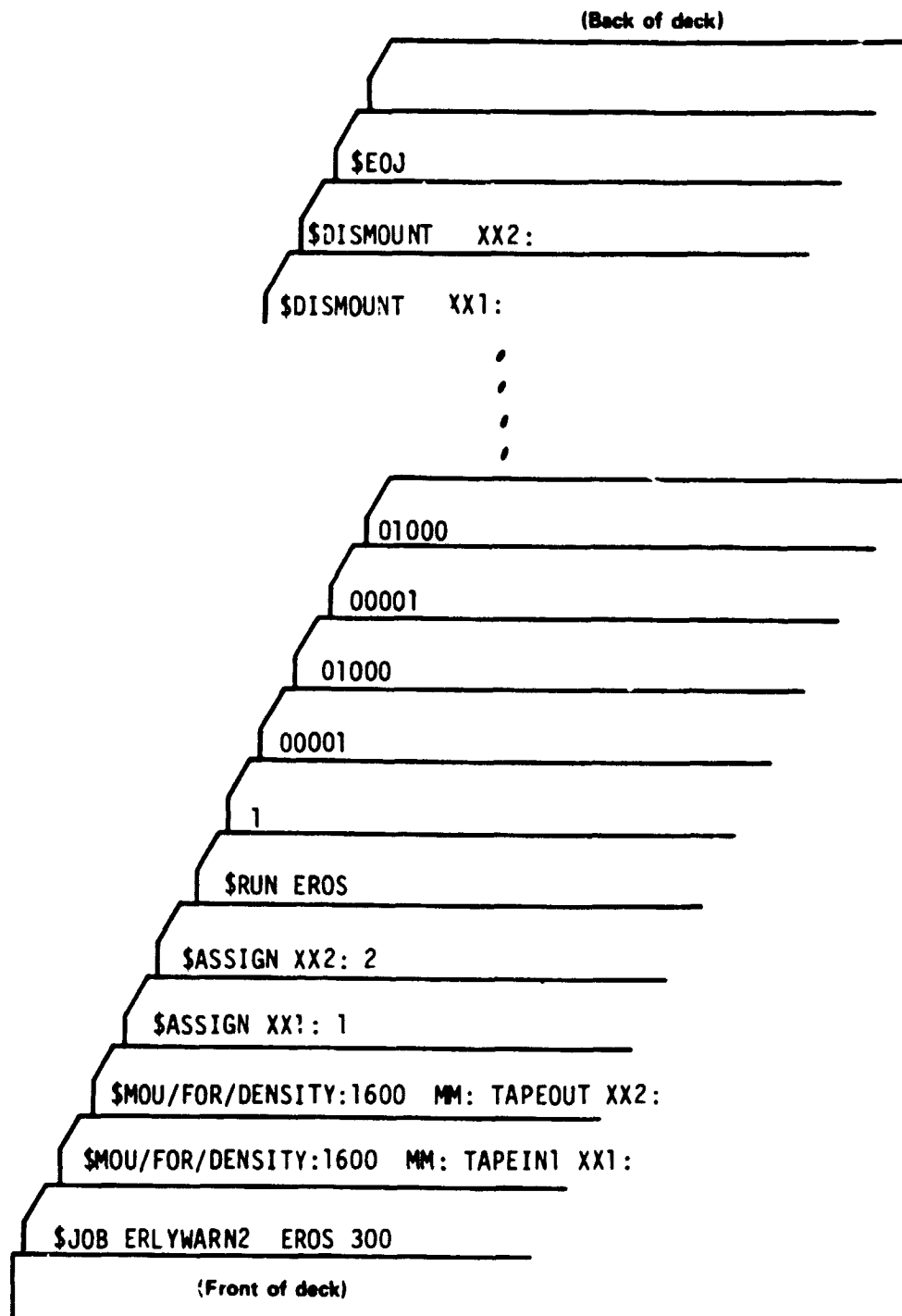


Figure 1  
Sample Input Deck  
3-2



#### 4. PROCESSING

##### 4.1 INTERACTIVE

Not applicable

##### 4.2 BATCH

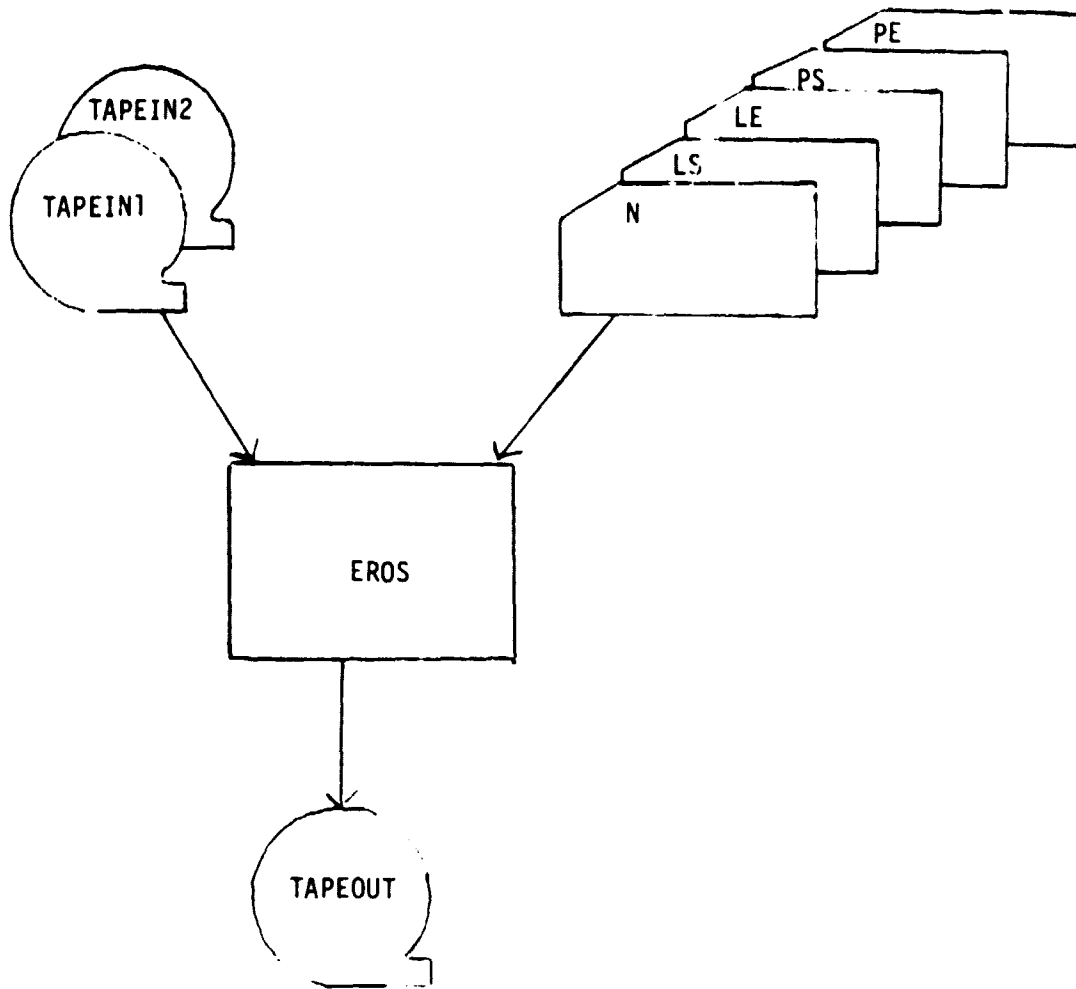
The user must submit the deck of cards described in figure 1 along with a Batch Job Request Form. The request form is as follows:

BATCH JOB REQUEST	NAME: S. O. O'Brien	DATE SUBMITTED 7/25/80
REQUEST INSTRUCTIONS:  Please mount tape TAPEIN1 on one drive. Mount tape TAPEOUT with Write Ring on other drive. Run job. If job requests next successive tape. Replace TAPEIN1 with TAPEIN2 and type 'C' to continue.		
COMPLETION DATE	OPERATOR	

FAGRS-104 (1-79)

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### 4.3 PROCESSING FLOW



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## 5. OUTPUT

### 5.1 TYPES OF OUTPUT

#### 5.1.1 TAPE

Universal Output Tape - see 1.5.4.

#### 5.1.2 DISK

None

#### 5.1.3 PAPER

No printer output unless a tape error is encountered. Up to 100 tape read errors are allowed before processing is aborted. Tape write errors cause the job to write an end of file and stop. Other tape errors cause the job to abort.

6. SPECIAL INSTRUCTIONS OR RESTRICTIONS

None

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