World Cities Project

NEW YORK, PARIS, LONDON AND TOKYO

International Longevity Center—USA 60 East 86th Street New York, NY 10028

http://www.nyu.edu/projects/rodwin/world_cp.htm

PROJECT OVERVIEW

The World Cities Project (WCP) originated as a joint research project between the International Longevity Center-USA and New York University's Robert F. Wagner Graduate School of Public Service. It has since grown to include the active involvement of the ILC-France, ILC-Japan, and ILC-UK. Also the City of Paris Department of Health and Social Affairs, the London Regional Office of the British National Health Service, the Tokyo Metropolitan Government Bureau of Health and Social Welfare, and the New York City Department of Aging and Department of Health have provided important support to the project. The project compares health, social services, and quality of life for persons aged 65 and over in the four largest urban agglomerations in the countries belonging to the Organization for Economic Cooperation and Development (OECD): New York, Paris, To-kyo and London.

Although these four cities have been the subject of numerous studies in the fields of architecture and urban planning, there have been few comparative studies of health and social services. Additionally, the WCP introduces a spatial perspective to more conventional economic and demographic analyses of population aging and longevity issues. Most comparative analyses of health systems focus on national averages that mask important variations within smaller jurisdictions. In contrast, the WCP relates smaller, more comparable units providing notable advantages for cross-national learning.

WORLD CITIES PROJECT STAFF

PROJECT DIRECTOR Victor G. Rodwin, Ph.D., M.P.H. Professor of Health Policy and Management, Robert F. Wagner Graduate School of Public Service at New York University

Senior Research Associate ILC

Victor.Rodwin@nyu.edu

INTERNATIONAL LONGEVITY CENTERS

USA

Robert N. Butler, M.D. President/CEO Robertb@ilcusa.org

UNITED KINGDOM Baroness Sally Greengross Director General Greengs@ace.org.uk

<u>New York</u>

ILC – USA Michael Gusmano, Ph.D. Associate Director WCP MichaelG@ilcusa.org

Research Associates: Birgit Bogler M.P.A. BirgitB@ilcusa.org Marilyn DeLuca R.N., C.N.A., Ph.D. rodesch@att.net Margaret Hodgson M.P.A. MargaretH@ilcusa.org Keiko Honda, R.N. KeikoH@ilcusa.org Gabriel Montero gabriel.montero@nyu.edu Daniel Weisz, M.D. DanielW@ilcusa.org

LONDON

ILC-UK Prof. Tony Warnes A.Warnes@Sheffield.ac.uk Wendy Sykes wendy.sykes@talk21.com

Health of Londoners Programme and The London Health Observatory Bobby Jacobson Bjacobson@lho.org.uk Justine Fitzpatrick jfitzpatrick@lho.org.uk FRANCE Françoise Forette, M.D. Director Francoise_forette@brc.ap-hop-paris.fr

> JAPAN Shigeo Morioka President ilc-japan@geocities.co.jp

PARIS City of Paris Department of Health and Social Affairs Robert Poinsard Special Assistant to the Director robert.poinsard@marie-paris.fr

Observatoire Régional de la Santé, Paris Region Ruth Ferry, Director ferry@orsidf.worldnet.fr

DRESS-Ministry of Health Diane Slama-Lequet drees-syn-ssdir-intern@sante.gouv.fr

<u>Токуо</u>

ILC-JAPAN Prof. Yukiko Kudo y kudo@musashino-wu.ac.jp

> National Institute of Public Health Prof. AtoZ Okamoto atoz@iph.go.jp

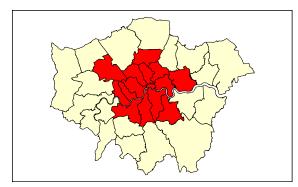
WCP GEOGRAPHIC UNITS

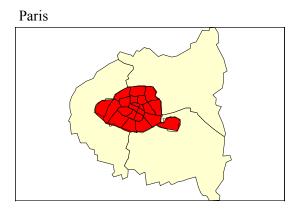
New York City: Urban Core = Manhattan; First Ring = Bronx, Brooklyn, Queens, & Staten Island.

Paris: Urban Core = 20 Arrondissements; First Ring = Hauts-de-Seine, Seine-St. Denis, and Val de Marne (3 departments). *London*: Urban Core = Inner London (14 boroughs plus City of London); First Ring = Outer London (18 boroughs). *Tokyo*: Urban Core = 11 inner wards; First Ring = 12 outer wards.



London





Tokyo



POPULATION

POPULATION (MILLIONS) AND DENSITY (PERSONS PER SQ. MILE)

	CORE	CORE DENSITY	First Ring	TOTAL
NYC (2000)	1.5	69,873	6.5	8.0
Paris (1999)	2.1	51,835	4.0	6.2
LONDON (1998 EST.)	2.7	21,639	4.4	7.2
Токуо (1995)	2.0	30,476	5.9	8.0

PERCENT FOREIGN BORN POPULATION

			INCLUDING Territories (Pari figures from 1990)	
	Core	First Ring	CORE	First Ring
NYC (2000)	27.3%	36.4%	33.1%	41.3%
Paris(1999)	22.7%	20.4%	26.6%	23.8%
London (1991)	27.8%	18.0%	40.8%	27.7%
Токуо (1998)	3.0%	1.6%	NA	NA

Note on Foreign Born data: In Tokyo there is no data on foreign born, only for "foreigners".

PHYSICIAN DENSITY - PER 10,000

	CORE	First Ring
NYC (1995)	71.2	33.9
PARIS (1998)	74.5	34.9
LONDON (2000)	36.9	10.3
Токуо (1998)	70.0	18.0

Physician Density

The density of physicians in Manhattan, Paris and Inner Tokyo is roughly the same – approximately 70 (per 10,000 population) which is more than twice that in the respective first rings.

ACUTE HOSPITAL BEDS - PER 1,000

	CORE	First Ring
NYC (1997)	8.9	3.5
Paris (1995)	9.6	6.3
London (1999/00)	3.7	1.4
Токуо (2000)	12.8	4.6

Hospitals as Exporters

Hospitals in these urban cores are significant exporters to their surrounding regions. For example, in Manhattan and Paris, resident admissions to all hospitals represent only about one-half of all hospital admissions.

NURSING HOME BEDS – PER 1,000 AGED 65+

MANHATTAN	PARIS	INNER	INNER TOKYO
(1998)	(1997)	LONDON (1992)	(2000)
33.3	22.8	15.8	14.7

Note on Nursing Home data: Paris includes Parisians in nursing home beds outside of Paris. Due to social hospitalization in Tokyo, long term bed counts substitute nursing home beds and therefore, the number of nursing home beds may be underestimated.

POPULATION HEALTH

LIFE EXPECTANCY AT BIRTH

	М	F
Manhattan (1990)	66.6	77.6
Paris (1991)	72.6	80.8
Inner London (1991)	73.1	79.3
Inner Tokyo (1996)	76.5	82.8

REMAINING YEARS OF LIFE AT 65

	М	F
Manhattan (1990)	15.7	19.5
Paris (1991)	16.8	20.8
Inner London (1991)	14.5	18.6
Inner Tokyo (1995)	16.5	21.1

INEQUALITY Manhattan is characterized by the highest level of inequality in the distribution of income.

INFANT MORTALITY PER 1,000, 1989 AND 1996

YEAR	MANHATTAN	PARIS	Inner London	Inner Tokyo
1989	12.1	7.3	9.3	4.7
1996	6.0	4.7	6.9	4.2

BIRTH RATES

Birth rates are roughly the same in Manhattan and Paris (around 48 per 1000 females aged 15-45), highest in Inner London (64.6) and lowest in Inner Tokyo (30.2).

1989 Figures, 1996 Figures

Each year is based on an average of 3 years from 1988-90 and 1995-97

TUBERCULOSIS RATES PER 100,000

MANHATTAN	PARIS	INNER	INNER
(1998)	(1997)	LONDON (1996)	Токуо (1998)
24.3	49.0	39.0	53.9

OLDER PERSONS POPULATION OF OLDER PERSONS

INSTITUTIONALIZATION (1990)

and 2.5% in Inner London.

	65+	85+
Manhattan (2000)	12.2%	1.7%
NYC First Ring	11.6%	1.5%
Paris (1999)	15.4%	2.8%
Paris First Ring	12.9%	1.9%
Inner London (1998 est.)	11.5%	1.3%
Outer London	13.7%	1.9%
Inner Tokyo (1995)	15.4%	1.3%
Outer Tokyo	13.1%	1.1%

Five percent of Manhattan's 75+ population lives in a nursing home or care facility compared to 3.8% in Paris

MOBILITY LIMITATIONS (1990/1991)

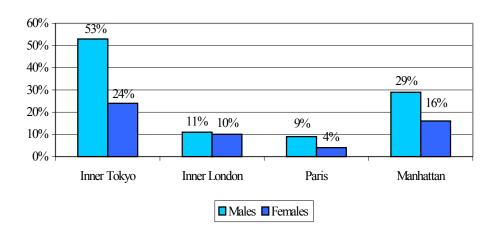
Twenty-four percent of Manhattanites aged 75+ report mobility limitations in leaving their homes. In Paris this rate is 21% (1995). In the United States, a person has a mobility limitation if he/she answer "yes" to the following question: "Because of a health condition that has lasted for 6 or more months, does the person have any difficulty going outside the home alone, for example, to shop or visit a doctor's office?" In France this disability is the combination of two questions: "Do you need someone's help to leave home, or do you not leave home?"

POPULATION PROJECTIONS FOR PERSONS 60+ IN 2015

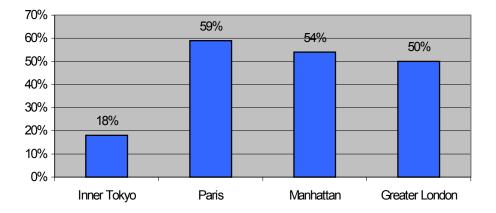
Manhattan	Paris	Inner London (2011)	Inner Tokyo
19%	20%	14%	35%

Tokyo is most rapidly aging of the four cities. In 2015 over one-third of Inner Tokyo's population will be aged 60+.

PRODUCTIVE AGING %65+ IN LABOR FORCE, 1990-91 (TOKYO 1997)

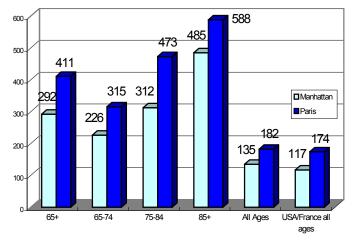


LIVING ALONE AGED 85+ 1990-91 (TOKYO 1996)



HEALTH SERVICES

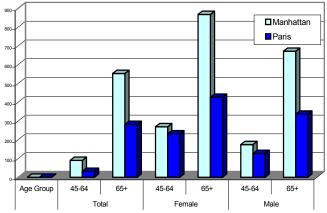
RATE OF ACUTE HOSPITAL ADMISSIONS/DISCHARGES* BY AGE GROUPS: MANHATTAN (1997) AND PARIS (1998)



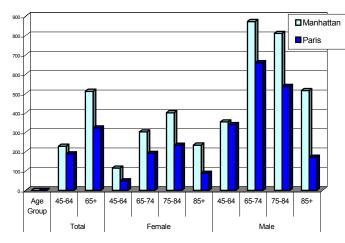
MORTALITY

Manhattan residents exhibit higher mortality for acute myocardial infarction, all ischemic heart disease, and hypertensive disorders than Paris residents.

Admission for Acute Myocardial Infarction Mahattan-Paris: 1998/1999 Average



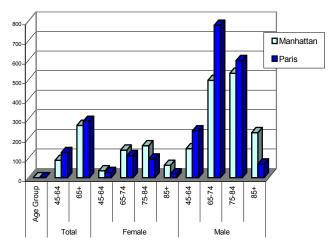
CORONARY ARTERY ANGIOPLASTY MANHATTAN- PARIS 1997-1999 AVERAGE



CORONARY BYPASS

Although, coronary bypass is performed at higher rates in Paris than Manhattan for men ages 45-74, there is no significant difference in the rate for men ages 75-84, and a higher rate in Manhattan among men ages 85 and above.

CORONARY ARTERY BYPASS MANHATTAN-PARIS: 1997-1999 AVERAGE



REFERENCES:

POPULATION

1990 Population (Millions) and Density (Persons per Square Mile) of Core and First Ring:

NYC: Census 2000 Summary File 1 Paris: INSEE 1995, Projection OMPHALE London: Office for National Statistics 1991 Tokyo: Tokyo Statistical Association (1997), Population Projections in Tokyo: By Sex and Age, pages 44, 45, 70

Percent Foreign Born Population (1990):

NYC: Foreign Born information is from Census 2000 Supplementary Survey, Total Population data comes from the Census 2000 Summary File 1

Paris: INSEE 1990

London: "A London Atlas" London Research Center, Census 1991

Tokyo: Alien population: Tokyo Statistical Association (1998). Tokyo Statistical Yearbook 1996, page 76. Total population: Tokyo Statistical Association (1998).

RESOURCES

Physician Density – Per 10,000:

NYC: NYDE, NYSDOH, 1995

Paris: Ministere de l'Emploi et de la Solidarite - SESI - repertoire ADELI au 1er janvier 98

London: London Health Observatory 2000

Tokyo: Tokyo Statistical Yearbook 1996. Tokyo Statistical Association 1998.

Acute Hospital Beds – Per 1,000:

NYC: Total includes chronic care, hospice, and other data not shown on table. Source: Health Care Annual, UHF, 1997

Paris: DRASS SAE, 1995. Rates based on 1995 population (source: INSEE projection OMPHALE)

London: London Health Observatory 2000

Tokyo: List of Medical Facilities 2000 from Bureau of Public Health, TMG

Nursing Home Beds – Per 1,000 Aged 65+:

NYC: Guide to Long-term Care in NYC, UHF, 1998 Paris: "Mini fichier des etablissements pour personnes agees en Ile-de-France" (published by ORS, December 1997). Reference population for Rate: 1995 population.

London: The Kings Fund 1992

Tokyo: Definitions: Ministry of Health and Welfare of Japan. New Gold Plan, page 9. Beds in geriatric and LTC hospitals: Ministry of Health and Welfare of Japan. Report on Medical Facilities and Hospitals: 1996. Beds in special nursing homes: Ministry of Health and Welfare of Japan. Report on Social Welfare Facilities: 1996. Beds in health facilities: Ministry of Health and Welfare of Japan. Report on Health Facilities for the Elderly: 1996.

OLDER PERSONS

Population of Older Persons:

NYC: Census 2000 Supplementary Survey Summary Tables Paris: INSEE 1999

London: Office for National Statistics 1998

Tokyo: Tokyo Statistical Association (1997), Population Projections in Tokyo: By Sex and Age, pages 44, 45, 70

Productive Ageing %65 + In Labor Force (1990):

NYC: Public Use Micro Date Sample 1990 Paris: INSEE 1990 London: Office for National Statistics/ LRC 1991 Tokyo: Population Census of Japan 1997

Living Alone Aged 85+ (1990):

NYC: Public Use Micro Date Sample 1990 Paris: INSEE 1990 London: London Research Center 1991

Tokyo: Tokyo Statistical Yearbook 1996. Tokyo Statistical Association 1998.

POPULATION HEALTH

Life Expectancy at Birth:

NYC: NYCDOH, 1991, 1995. Life expectancy numbers are 1990 data from the National Center for Health Statistics **Paris:** INSEE 1991

London: Office for National Statistics 1991

Tokyo: Tokyo Statistical Association (1998). Tokyo Statistical Yearbook: 1996, page 4

Life Expectancy at 65:

NYC: NYCDOH, 1991, 1995. Life expectancy numbers are 1990 data from the National Center for Health Statistics Paris: INSEE London: Office for National Statistics 1991 Tokyo: Tokyo Statistical Yearbook: 1996, page 4

Infant Mortality per 100,000, 1989 and 1996:

NYC: NYCDOH, 1991, 1995.

Paris: INSERM 1990. NB : Les Donnees de Demographie Regionale 1990 de l'INSEE donnent des taux plus eleves : 7.5 pour la France, 7.6 pour l'Ile-de-France, et 8.3 pour Paris, INSEREM 1995
London: Office for National Statistics 1991 Births, Deaths Data
Tokyo: Annual Report on Health in Tokyo. Bureau of Public Health, TMG 1991,1996

Tuberculosis Rates per 1,000:

NYC: New York State Department of Health/County Health Indicator Profiles 1998

Paris: Ministere des Affaires Sociales, de la Sante et de la Ville. IN-SERM 1997

London: University of Nottingham

Tokyo: "Tuberculosis in Tokyo, 1998" Bureau of Public Health, TMG 2000

HEALTH SERVICES

Rate of Acute Hospital Admissions/Discharges by Age Groups: Manhattan (1997) and Paris (1998): Manhattan: SPARCS 1997 Paris: PMSI 1998

Admission for Acute Myocardial Infarction Manhattan –Paris: 1998/99 Average: Manhattan: SPARCS 1998/99 Paris: PMSI 1998/99

Coronary Artery Angioplasty Manhattan-Paris 1997-1999 Average: Manhattan: SPARCS 1997/98/99

Paris: PMSI 1997/98/99

Coronary Artery Bypass Manhattan-Paris 1997-1999 Average: Manhattan: SPARCS 1997/98/99 **Paris:** PMSI 1997/98/99