Rijksuniversiteit Groningen

THE POPULATION OF INDONESIA

REGIONAL DEMOGRAPHIC SCENARIOS USING A MULTIREGIONAL METHOD AND MULTIPLE DATA SOURCES

Proefschrift

ter verkrijging van het doctoraat in de Ruimtelijke Wetenschappen aan de Rijksuniversiteit Groningen op gezag van de Rector Magnificus, dr. D.F.J. Bosscher, in het openbaar te verdedigen op donderdag 2 mei 2002 om 14.15 uur

door

Salahudin Muhidin

geboren op 10 september 1970 te Jakarta, Indonesie The book series Population Studies aims at disseminating results of research on population trends, in the broadest sense.

Series editorial board: Anton Oskamp, Ewa Tabeau & Harrie van Vianen. In memory of Anton Kuijsten.

Manuscripts can be submitted to Rozenberg Publishers, Rozengracht 176A, 1016 NK Amsterdam, The Netherlands. E-mail: info@rozenbergps.com

The following books have been published in the Population Studies series:

- Jiang Leiwen, Population and Sustainable Development in China. 1999. ISBN 90 5538 004 X
- Gijs Beets & Károly Miltény (eds.), Population Ageing in Hungary and the Netherlands;
 A European perspective. 2000, ISBN 9051705069
- Henk Hilderink, World Population in Transition; An integrated regional modelling framework. 2000, ISBN 9055380482
- Melinda Mills, The Transformation of Partnerships; Canada, The Netherlands, and The Russian Federation in the age of modernity. 2000, ISBN 9051705263
- Willem Jan van der Veen, The Small Epidemiologic Transition; On infant survival and childhood handicap in low-mortality countries. 2001, ISBN 9051705549
- Cecile Wijsen, Timing Children at a later Age; Motivational, behavioural, and sociostructural differentials in the individual decision making process of older mothers. 2002, ISBN 9051705883

ISBN 90 5170 596 4 NUR 630

© S. Muhidin, 2002

Cover design: .Spatie (puntspatie), Amsterdam

All rights reserved. Save exceptions stated by the law, no part of this publication may be reproduced, stored in a retrieval system of any nature, or transmitted in any form or by any means, electronic, mechanical, photocopying, recording or otherwise, included a complete or partial transcription, without the prior written permission of the publishers, application for which should be addressed to the publishers: Rozenberg Publishers, Rozengracht 176A, 1016 NK Amsterdam. Tel.: (+) 31 20 625 54 29. Fax: (+) 31 20 620 33 95. E-mail: info@rozenbergps.com

Table 2.5. Age-specific fertility rates and their distribution estimated by direct and indirect methods, Indonesia, 1967-1997

Mother's age	Indirectly estimated				Directly estimated			
	PC 71 1967-70	PC 80 1976-79	PC 90 1986-89	IPS 95 1991-95	NICPS 87 1984-87	IDHS 91 1988-91	IDHS 94 1992-94	IDHS 97 1995-97
15-19	155	116	71	61	78	67	61	62
20-24	286	248	178	151	188	162	147	143
25-29	273	232	172	146	172	157	150	149
30-34	211	177	128	105	126	117	109	108
35-39	124	104	73	63	75	73	68	66
40-44	55	46	31	27	29	23	31	24
45-49	17	13	9	8	10	7	4	6
TFR	5.61	4.68	3.33	2.80	3.39	3.02	2.85	2.78
Percentage a	listribution							
15-19	14	12	11	11	12	11	11	11
20-24	26	26	27	27	28	27	26	26
25-29	24	25	26	26	25	26	26	27
30-34	19	19	19	19	19	19	19	19
35-39	11	11	11	11	11	12	12	12
40-44	5	5	5	5	4	4	5	4
45-49	2	1	1	1	1	1	1	1
Total	100	100	100	100	100	100	100	100

Source: As compiled in the 1997 IDHS (ICBS et al., 1998)

The percentage distribution of ASFR, which is calculated by dividing the ASFR with the sum of fertility rates and multiplying the results by 100, is provided in Table 2.5 and shown in Figure 2.5B. Based on the 1997 IDHS data, 11 percent of fertility rates were attributed to the fertility rates of women in age group 15-19 years. This figure shows that although the shape of fertility rates' curves has changed over time, the percentage distributions of fertility rates by age group have been relatively constant, particularly for women in age group 30-34 years. Over time, women aged 30-34 years account for about 19 percent of the total fertility rates. However, this has changed little for women aged 20-29 years: 24 percent in the period 1967-1970 and 28 percent in the period 1995-1997.

In more general terms, the shape of the age distributions of fertility rates may remain invariant, the so-called no tempo effect (distortion due to changes in the mean age of childbearing). Once the tempo effects are present, then the distribution may shift to higher or lower ages over time. The TFR that would have been observed in the absence of changes in the timing of childbearing is defined as a quantum (see further discussion about tempo and quantum in Bongaarts and Feeney, 1998). The invariance in Indonesian fertility may due to the fact that the fertility rates were estimated by the indirect methods and clustered into five-year age groups.