Married Couples and Their Labour Market Status

A Study of the Relationship between the Labour Market Status of Partners

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ABSTRACT   In this article we raise the question whether there is a relationship between the labour-market status of partners in the Netherlands in 1985–6. Possible explanations for such a relationship are represented by three hypotheses, namely the shared restrictions hypothesis, the spouse selection hypothesis, and the influence hypothesis. The explanations mentioned are tested for four types of labour-market status, namely employed, unemployed, disabled, and doing housework.

Our analyses indicate that a relationship between the labour-market statuses of partners does exist and that the hypotheses provide sufficient explanation for the observed (non)-employment homogamy. For disablement homogamy and (un)employment homogamy we find hardly any indication that shared restrictions, spouse selection, or mutual influence play an important role. After controlling for these possible explanations it remains the case that unemployed and disabled persons more often have an unemployed or disabled partner and less often have an employed partner.

INTRODUCTION

Although the labour-force participation of women in the Netherlands is still low compared to neighbouring countries (Eurostat, 1986), the labour-force participation of married women has increased rapidly in the past decade. In 1985 it was ascertained that 53 per cent of Dutch households had more than one bread-winner or receiver of benefits (NCBS, 1985). In the near future, a further increase in the number of dual-earner couples (including income from a job or benefits) is expected due to the economic independence of women and the growing skill shortages in the labour-market. It will become more and more common that both partners contribute to the household budget, which will have important consequences for the distribution of income and benefits across households.

Considering such developments, it is interesting to investigate whether there is an accumulation of income from jobs or from social benefits. Will there be an increase in households which have two incomes or which have to make do with two social benefits? It is true that being employed, unemployed, or disabled will more often occur simultaneously for both partners? In order to answer such questions, empirical research on the relationship between the labour-market status of members of the same household is required. Thus the initial research question might be: 'Is there a relationship between the labour-market status of spouses and, if this is the case, how can this relationship be explained?' This question is scientifically interesting from the viewpoint of social stratification. If there is a tendency towards households consisting of dual-earner couples and households consisting of

unemployed couples, we may call this a tendency to a 'new' closedness in society. The accumulation of certain types of labour-market status within households signifies a stratification of society at the household level. In this way, an open society at the individual level can be closed at the household level.

For a long time research on social stratification was concerned with inter-generational mobility (Ultee, 1989), and addressed the question of whether a society had become more open. One indicator of such openness is the diminishing influence of ascriptive characteristics for attaining a certain educational or occupational level. Various surveys show that, in the Netherlands, inter-generational educational and occupational mobility has indeed increased (Ganzeboom and DeGraaf, 1984; Luijkx and Ganzeboom, 1989). In Dutch society, characteristics of the parents (usually the father) are becoming less important when explaining the occupational and educational level attained by an individual.

Within stratification research, further attention is paid to the role of selection processes when choosing a spouse (Sixma and Ultee, 1984; Dessens et al., 1990). In these homogamy studies, it has been found that individuals choose each other on the basis of a number of mutual characteristics. Educational level and age seem to be the most important factors when selecting a spouse. Analyses of these marriage patterns show that people usually prefer a spouse with a similar educational level and of a similar age (Sixma and Ultee, 1984). This type of homogamy study provides the opportunity to place the stratification of a society in a broader 'household' perspective. Previous stratification studies emphasized individual upward or downward mobility; homogamy surveys provide the opportunity to consider the accumulation of (un)favourable characteristics within one household. Therefore, the open or closed nature of a society can be studied at the married-couple level. In homogamy research, studies on (un)employment homogamy are a relatively new feature.

In recent years, research on the relationship between the labour-market status of partners has become increasingly popular (Ultee et al., 1988;

De Graaf and Ultee, 1991). The main issue here is whether, and to what extent, the labour-market status of spouses is related, and secondly, how this relationship can be explained. Based on data from 1975, Nieuwenburg and Siegers (1981) found that the chance of a respondent being disabled is considerably higher if the spouse is disabled. Ultee et al. (1988) notice the same relationship for employed and unemployed persons. Employed persons have a working partner relatively more often, and unemployed persons have an unemployed partner relatively more often. De Graaf and Ultee (1991) also found that when predicting the labour-market status of a person, the labour-market status of the spouse is important. Using an event-history analysis, they also study the issue of whether, and how, influencing processes play a role for spouses. They found that having an employed spouse reduces the chance of becoming unemployed, and the chance of finding another job after being unemployed is higher if one has an employed spouse (De Graaf and Ultee, 1991). For elderly persons, Henkens and Siegers (1991) found that the chance of early retirement is higher if the spouse is retired.

In this article we aim to make a link with a study by Ultee et al. (1988) on the relationship between the labour-market status of the partners. In their study, they first answer the question of the extent to which a discovered (un)employment homogamy can be explained by an educational homogamy. After all, given the relationship between the educational levels of spouses, on the one hand, and the relationship between education and unemployment, on the other, a certain degree of (un)employment homogamy can be expected. This (un)employment homogamy can be considered to be a by-product of educational homogamy. It is assumed that individuals do not select a spouse on the basis of his or her labour-market status. Ultee et al. (1988) conclude that for the Netherlands, Canada, and the United States the observed (un)employment homogamy cannot be explained as a by-product of educational homogamy. A stricter test is conducted for the United States on this by-product explanation. In these analyses, in addition to educational level, age and the

labour-market situation in 'the state of residence' are also taken into account. Nevertheless, the largest proportion of the relationship between the labour-market status of married couples in the United States remains unexplained (Ultee *et al.*, 1988).

The subject of this article is the relationship between the labour-market status of married couples in the Netherlands. Considering the interest in issues regarding labour-force participation, the following formulation of the research question seems relevant:

Is there a relationship in the Netherlands between the labour-market status of partners, and if there is, how can this relationship be explained?

In explaining the relationship between the labour-market status of partners, Ultee *et al.* (1988) use the by-product explanation outlined above. In our view this explanation could become clearer if it is divided into two separate hypotheses, namely a *shared restriction hypothesis* and a *spouse selection hypothesis*. In addition to these two hypotheses, we assume that a better explanation of the relationship between partner's labour-market status can be attained by supplementing the by-product explanation with a third hypothesis, the *influence hypothesis*. We will describe these three hypotheses below.

The relationship between the labour-market status of partners must first be explained by indicating the circumstances which are common to both spouses i.e. their 'shared restrictions'. If a person lives in a district with high unemployment, then the probability that the spouse is also unemployed is higher. In their article on testing the by-product explanation for the United States, Ultee *et al.* also take the labour-market conditions into account. However, the data available to them were rather crude (at the state level), and resulted in a non-response of 61 per cent of the number of cases due to missing data. We assume that with detailed information on the labour-market restrictions in the district, part of the relationship between the labour-market status of partners can be explained.

The second hypothesis which could provide an explanation for this relationship is the *spouse selection hypothesis*. The idea is that individuals select each other because they have certain characteristics in common. The most important selection criteria when choosing a spouse seem to be education and age. Various studies have shown that there is a high degree of educational and age homogamy between spouses (De Hoog, 1979). Persons with a higher level of education meet other persons with higher levels of education; the young marry the young. Because educational level and age are also strong predictors of status in the labour-market, a relationship between the labour-market status of partners can also be explained by the educational and age homogamy of the spouses. Given the relationship between educational level and age of spouses on the one hand, and the relationship between status in the labour-market and age and education on the other hand, we expect a relationship between the labour-market status of partners.

A third hypothesis has been formulated for the direct *mutual influencing* of spouses. The idea here is that individual characteristics of the spouse (education and age) have a direct influence on the labour-market status of the spouse. Therefore, we introduce the educational level and age of the spouse as predictors in the model. This extension with cross-effects has been chosen because the assumption is that education is not only beneficial to the person concerned. Other persons in the social network can also benefit from the knowledge and skills acquired by education and age. Thus it is expected that a person can benefit from a spouse with a higher level of education. A more highly educated spouse can assist in the search for a new job and in applying for a job, and can give useful advice (Dirven, *et al.*, 1990). Consequently, the relationship between partners can also be explained by this influencing hypothesis.

These three hypotheses can be considered as the elaboration of Ultee's by-product hypothesis. Integrated testing of the three hypotheses for the Netherlands is discussed in this article and involves utilizing detailed information on the regional labour-market situation. In this article we also distinguish four types of labour-market status of spouses:

employed, unemployed, disabled, and doing housework. This distinction has been chosen because the number of disabled persons in the Netherlands has increased rapidly. At this moment, the number of persons disabled for work is higher than the number of unemployed persons, and a further increase in disabled persons is expected (Aarts and De Jong, 1990). The relationships between these four types of labour-market status of partners are simultaneously modelled. This also provides the opportunity, in addition to employed, unemployed, or disabled homogamy, to consider the relationships between the various types of labour-market status. For example, this enables one to answer the question of the extent to which there is a relationship between one person being unemployed and the spouse being disabled, as well as between one person being disabled and the spouse being employed.

In this article, the next section deals with the data and variables used in the study. Section 3.1 provides a description of the labour-market status of married couples using bivariate relationships. Later we examine how (un)employment homogamy can be explained by the three hypotheses. This analysis is then elaborated into a simultaneous analysis of the relationships between the four possible types of labour-market status of partners. The final section contains conclusions and a discussion.

SAMPLE AND OPERATIONAL DEFINITIONS

To answer the research question about the existence of relationships between the labour-market status of partners, this article uses data from the 'Housing Demand Study 1985/86', conducted by the Netherlands Central Bureau of Statistics (NCBS). This cross-sectional data-set contains information on education, age, labour-market status, and place of residence for the respondents and their spouses. Information concerning the area of the Manpower Office District (GAB) in which the person resided was derived from the place of residence of the respondent. Subsequently, the unemployment figure for each GAB district was calculated. The Netherlands can be divided into 126 different GAB districts and, consequently, an indicator

was obtained for each respondent on the labour-market situation in their immediate vicinity.[1]

Data on 22,352 married couples were utilized. In all of these households both spouses are between 20 and 54 years old, and each is placed into one of the following four categories; employed, unemployed, disabled for work, or doing housework. Married couples of which one or both spouses belong to the categories of retired, trainee/student, in military service, working while maintaining full social benefit, and working in the parents' or spouse's business and not appearing on the wage list are not included in the analysis. In this way 882 married couples were excluded from the sample (i.e. 3.8 per cent of the original sample).

THE LABOUR-MARKET STATUS OF MARRIED COUPLES

The Relationship between the Labour-Market Status of Partners

The relationship between the labour-market status of partners has initially been studied using a simple 4 × 4 cross-table (Table 1). This table shows that in 7,130 (32 per cent) of all 22,352 households, both spouses are gainfully employed. On the basis of this table, it is simple to ascertain a relationship between both spouses being employed and not being employed. For this purpose, persons disabled for work, unemployed persons, and persons doing housework are combined in one category. The relationship between spouses who are employed and spouses who are not employed can be presented by a so-called odds ratio.[2] The advantage of using an odds ratio is that it is not sensitive to the marginal distribution in the table. The marginal distribution reflects the distribution of labour in society. However, a proper distinction must be made between the terms 'distribution' and 'association'. It is possible that the distribution of labour in society may change (e.g. more women will be working for pay), without this changing the relationship between the labour-market statuses of both spouses. The marginal distribution can change without altering the odds ratio (see Hout, 1983: 16).

TABLE 1 *The labour-market status of wives and husbands in the Netherlands, 1985 (N = 22,352)*

Labour-market status of the wife	Labour-market status of the husband				
	Employed	Unemployed	Disabled	Doing housework	Total
Employed	7,130	200	286	143	7,759
	91.9%	2.6%	3.7%	1.8%	100.0%
Unemployed	242	60	14	10	326
	74.2%	18.4%	4.3%	3.1%	100.0%
Disabled	214	27	49	6	296
	72.3%	9.1%	16.6%	2.0%	100.0%
Doing housework	12,678	660	619	14	13,971
	90.8%	4.7%	4.4%	0.1%	100.0%
TOTAL	20,264	947	968	173	22,352
	90.7%	4.2%	4.3%	0.8%	100.0%

Source: Housing Demand Survey 1985/6.

In Table 1, the odds ratio is 1.3 for employed/not-employed spouses. This means that the probability that one person works for pay is 1.3 times higher if the other spouse also works for pay. This result corresponds with the findings of Ultee *et al.* (1988) and De Graaf and Ultee (1991): there is a positive relationship between whether spouses work for pay or not. There is also a strong association between employed and unemployed, and employed and disabled. The probability of one of the spouses being unemployed is 8.8 times higher with an unemployed spouse than with an employed spouse. And the probability that a person is disabled is 5.7 times higher if the spouse is disabled, than if the spouse is employed.

Using a bivariate analysis, it has been demonstrated in this section that there is a relationship ·between the labour-market status of partners. The next section deals with the extent to which the relationship between employed and unemployed spouses can be explained by the shared restriction hypothesis, the spouse selection hypothesis, and the influence hypothesis, respectively.
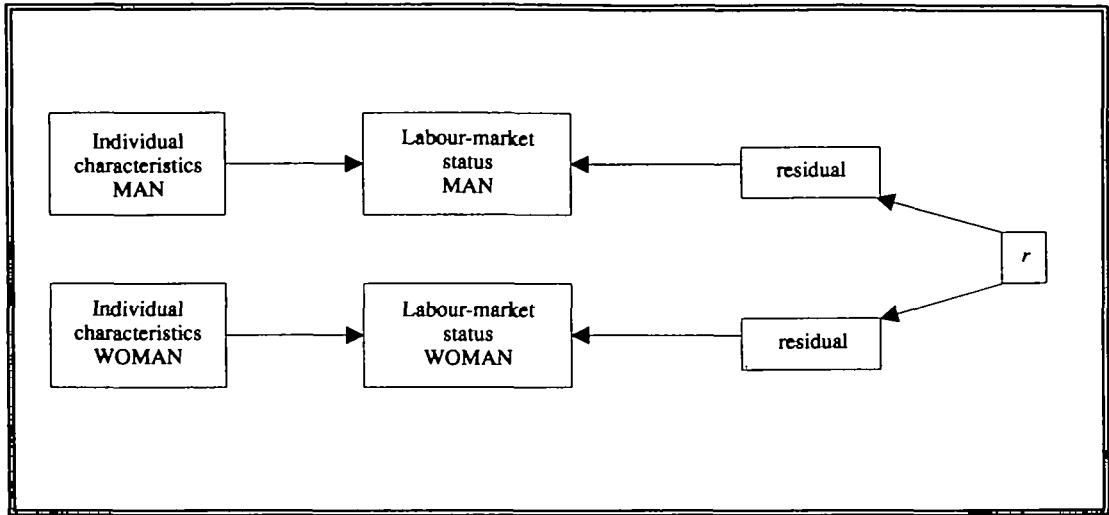
(Un)employment Homogamy
Ultee *et al.* (1988) demonstrate that for the Netherlands (un)employment homogamy can only be partially explained using underlying educational homogamy. They obtain these results by estimating the probability of unemployment for both spouses separately, in a logit analysis, on the basis of individual characteristics (Figure 1A). Next, the residuals are calculated for both spouses and then correlated. A drop in the residual correlation then becomes an indication of the extent to which the relationship between these characteristics explains the relationship between spouses being employed and unemployed. Thus the residual correlation can be considered as the correlation between the labour-force status of spouses, after controlling for the effects of shared labour-market restrictions and spouse selection.

On the basis of the shared restriction hypothesis and the spouse selection hypothesis formulated by us, an ascertained (un)employment homogamy can be explained at least partly using the underlying age and educational homogamy, and also from restrictions on the labour-market which the spouses have in common. The third hypothesis attributes the relationship to influencing processes between spouses (Figure 1B). The extent to which these hypotheses explain the ascertained (un)employment homogamy can be seen by the drop in the residual correlation after introducing restrictions, individual characteristics, and partner characteristics. If there is no correlation between the residuals, this means that an initial

MODEL A: Individual characteristics

MODEL B: Individual characteristics, shared restrictions, and mutual influencing.
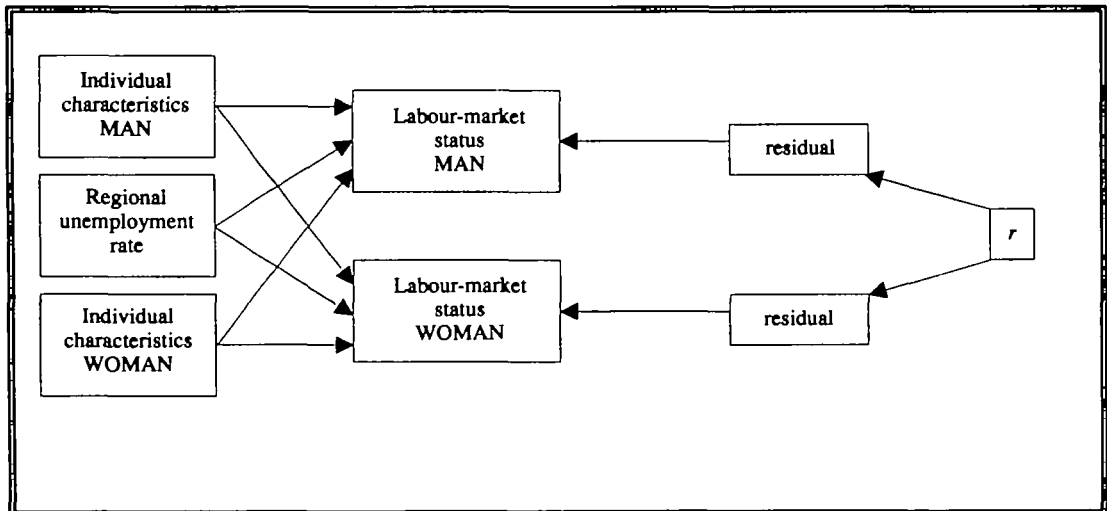

FIGURE 1   *Graphic representation of the models explaining the relationship between the labour-market status of partners*

relationship between labour-force status can be traced back to the underlying effects of shared labour-market restrictions, spouse selection, and mutual influencing.

Table 2 presents the results of a test of the three hypotheses for the Dutch situation. The first logit model exclusively contains the general mean as predictor. This means that the effects of shared restrictions, spouse selection, and mutual influencing processes have not been controlled for. The second model only takes the shared restrictions into account. The third model introduces the influences of spouse selection.[3]

In Table 2 we see that (un)employment homogamy cannot be explained by the shared restriction hypothesis and the spouse selection

TABLE 2 *Residual correlations for wives and husbands, based on four logit models explaining the odds of being (un)employed (N = 7632)*

Logit model	Residual correlation
1 General mean	.184[a]
2 Model with shared restrictions unemployment in the region	.183[a]

3 Model with shared restrictions and
    spouse selection
    unemployment in the region
    education + age
	.183[a]

4 Model with shared restrictions and
    spouse selection and mutual influence
    unemployment in the region
    education + age
    education spouse + age spouse
	.183[a]

[a]Significant $p < .001$
Source: Housing Demand Survey 1985/86

hypothesis operationalized by us. The residual correlation drops from 0.184 if only the general mean is taken as predictor to 0.183 if the shared restrictions of the partners are also taken into account. Unemployment rates in the region have a significant effect for both men and women on the odds of being employed as opposed to unemployed (for men $chi^2 = 34.9$; for women $chi^2 = 4.9$ with $df = 1$). However, the drop in the residual correlation is not significant. When the predictors age and education are subsequently introduced, there is no further decrease. A tentative conclusion could be that the shared restriction hypothesis and spouse selection hypothesis do not provide an explanation for the ascertained (un)employment homogamy.[4]

Finally, the influencing hypothesis is tested in a fourth model. In this model, the education and age of the partner are included as direct predictors of being employed or unemployed. This extension does not provide an improved explanation for the (un)employment homogamy either. A significant residual correlation of 0.183 remains. The above analyses were also performed with dummy variables in order to control for non-linearity and the inclusion of interaction terms. Relevant changes in the explanation of (un)employment homogamy were not found. A significant relationship

remains between the labour-force statuses of spouses.

A major disadvantage of the above analyses is that only two labour-force statuses have been considered. Due to this, it remains unclear which labour-force status has the strongest relationship. After the above explanations have been taken into account, is it a case of employment homogamy or unemployment homogamy? Are employed persons more often married to employed persons, or the unemployed to the unemployed, or is the relationship applicable to both groups? These types of questions cannot be answered on the basis of the above analyses. But if more labour-force statuses are included in the analysis, then they can be answered. The model is extended in the next section to include persons disabled for work and those who perform housework, in addition to employed and unemployed persons. This enables us to examine the relationship between four different labour-force statuses, and to distinguish between the homogamy for these labour-force statuses.

The Homogamy of Four Labour-Force Statuses
A multi-nomial logit analysis was utilized in order to analyse the relationship between the four types of labour-force status of married couples. A multi-nomial logit (MNL) model provides the opportunity to make a multi-variate analysis of a discrete dependent variable with more than two categories.[5] This article discusses four types of labour-force status. The category 'employed' has been chosen as the reference category. Unemployed persons, persons disabled for work, and those who perform housework were subsequently compared in a multi-nomial logit analysis, with 'employed' being the reference category.[6] Next, on the basis of the individual results, the probability of being in one of these four types of labour-force status was calculated.[7] These probabilities add up to one for each individual.

In our analyses of the relationship between the labour-force statuses of married couples, a total of four multi-nomial logit models were estimated. The models are presented in Table 3, two for both men and women, firstly, a model for testing the shared restriction hypothesis and the spouse selection hypothesis, and secondly,

TABLE 3 *Multi-nomial logit analysis explaining labour-market status of spouses aged 20–54 (N = 22,352).*

Women

Explanatory variables	Logit-coefficients (*t*-values)					
	Unemployed		Disabled		Doing housework	
	Model 1	Model 2	Model 1	Model 2	Model 1	Model 2
Constant	− 2.743ᵃ	− 2.826ᵃ	− 4.912ᵃ	− 4.734ᵃ	1.701ᵃ	1.682ᵃ
	(− 6.98)	(− 6.78)	(− 10.6)	(− 9.51)	(16.2)	(15.2)
Age	− .021	− .018	.070ᵃ	.052ᵃ	.022ᵃ	.025ᵃ
	(− 2.98)	(− 0.98)	(9.34)	(2.75)	(11.9)	(5.28)
Education	− .015	− .032	− .186ᵃ	− .135ᵃ	− .179ᵃ	− .186ᵃ
	(− 0.71)	(− 1.24)	(− 7.65)	(− 4.61)	(− 30.9)	(− 27.2)
Unemployment in the region	.029ᵃ	.030ᵃ	.053ᵃ	.051ᵃ	− .005	− .004
	(2.62)	(2.67)	(4.49)	(4.35)	(− 1.56)	(− 1.47)
Age of spouse		− .004		.020		− .004
		(− 0.20)		(1.05)		(− 0.76)
Education of spouse		.025		− .075ᵃ		.011
		(1.14)		(− 2.98)		(1.91)

Model Characteristics
Model 1: Loglikelihood (− 16714.2), chi² = 1442.4 *df* = 9
Model 2: Loglikelihood (− 16703.4), chi² = 1464.0 *df* = 15

Men

Explanatory variables	Logit-coefficients (*t*-values)					
	Unemployed		Disabled		Doing housework	
	Model 1	Model 2	Model 1	Model 2	Model 1	Model 2
Constant	− 0.710ᵃ	0.154	− 5.149ᵃ	− 4.594ᵃ	− 2.710ᵃ	− 4.386ᵃ
	(− 2.91)	(0.54)	(− 18.1)	(− 14.7)	(− 4.99)	(15.2)
Age	− .025ᵃ	.011	.101ᵃ	.112ᵃ	− .004	− .038
	(− 6.03)	(1.03)	(21.2)	(10.6)	(− 0.47)	(− 1.50)
Education	− .267ᵃ	− .210ᵃ	− .288ᵃ	− .254ᵃ	− .184ᵃ	− .289ᵃ
	(− 19.1)	(− 13.4)	(− 20.5)	(− 16.1)	(− .32)	(− 8.96)
Unemployment in the region	.077ᵃ	.076ᵃ	.045ᵃ	.044ᵃ	.001	− .002
	(11.6)	(11.4)	(6.58)	(6.51)	(0.05)	(− 0.16)
Age of spouse		− .044ᵃ		− .016		.045
		(− 4.23)		(1.05)		(1.82)
Education of spouse		− .128		− .079ᵃ		.229ᵃ
		(− 7.17)		(− 4.43)		(7.15)

Model Characteristics
Model 1: Loglikelihood (− 7926.4), chi² = 1869.4 *df* = 9
Model 2: Loglikelihood (− 7859.1), chi² = 2004.0, *df* = 15
ᵃSignificant *p* < .001
Source: Housing Demand Survey 1985/6

a model which also tests mutual influencing processes (Figure 1*B*; the complete model). The influencing hypothesis is incorporated in the second model, based on the assumption that the age and educational level of a person directly influence the labour-force status of the partner. This modelling of mutual influencing processes within homogamy analyses has been utilized previously by Dirven *et al.* (1991) and Dessens *et al.* (1990).

In the multi-nomial logit model excluding mutual influencing effects (Model 1), it can be established that the woman's chance of being disabled for work and being a housewife is mainly determined by her own educational level. The lower the level of the woman's education, the greater are her chances of being disabled for work or of being a housewife. Labour-force restrictions also influence the employment status of the woman. As the unemployment rate is higher in the region in which the woman lives, it appears that compared with a paid job, not only the probability of being unemployed is higher, but also the probability of being disabled for work.

Similar results were found for men. The level of education is particularly important in the explanation of labour-force status. Furthermore, there is a strong age effect relating to disability for work. The older the man is, the greater are his chances of being disabled for work. It also applies for men that as the unemployment rate in their region is higher, the probabilities of being disabled for work and of being unemployed are higher as well.

When testing the second model with mutual influencing, we note that for women the influence of the husband on their labour-force status is slight. Only in the case of a partner with a low level of education is there a greater probability that the woman is disabled for work. For men, however, it appears that their spouse's characteristics are important. The younger and less educated a woman is, the greater the chance that her husband is unemployed. Moreover, the probability of the husband being disabled for work is greater if he has an older female spouse. Characteristics of the wife play a more relevant role for their husbands with respect to labour-force status, while the reverse is much less often

the case. From the fact that the effects of one's own education and age decrease after including spouse characteristics, it can be concluded that coefficients found in Model 1 (excluding cross-effects) also partly reflects the influence of the spouse's resources.

Based on the multi-nomial logit models described above, probabilities were estimated for each individual on whether they were employed, disabled for work, or did housework. For instance, based on Model 1, the following probabilities can be calculated in Table 3 for a fifty-year-old man with a low level of education who lives in an area with an officially registered unemployment rate of 10 per cent: 75 per cent employed, 19 per cent disabled for work, 5 per cent unemployed, and 1 per cent performing housework. For a woman aged 50 years with a university education who lives in the same area, these percentages are: 57 per cent employed, 1 per cent disabled for work, 1 per cent unemployed, 41 per cent doing housework.

In addition to these probabilities, residuals were calculated for men and women for these labour-force statuses. The relationship between the labour-force status of partners is then presented by the correlation between these residuals (Table 4). Consequently, there are 16 possible labour-force status combinations for spouses.

Three residual correlations are given in Table 4 for all 16 combinations of labour-force status. The first (top) coefficient is related to the case where only the 'general mean' has been used as predictor, without controlling for the effects of shared restrictions, spouse selection, and mutual influencing. The 'general mean' can be considered as a reflection of the relationship similar to the one presented in the cross-table of labour-force statuses (Table 1). The second coefficient is the residual correlation, after taking into account the unemployment rate in the region and educational and age homogamy. The third (bottom) residual correlation reflects the situation if the spouse's characteristics have also been included in the prediction (incorporating the influencing hypothesis). Here too it applies that the explanatory power of the formulated hypotheses is greater if the residual correlation drops further.

TABLE 4 *Residual correlations of the labour-market status of spouses based on three multi-nomial logit models explaining the probability of being employed, unemployed, disabled, or doing housework (N = 22,352)*

Labour-market status of the wife	Labour-market status of the husband			
	Employed	Unemployed	Disabled	Doing housework
Employed	.031[a]	− .061[a]	− .023[a]	.089[a]
	.000	− .046[a]	.008	.087[a]
	.000	− .046[a]	.007	.008[a]
Unemployed	− .069[a]	.086[a]	− .000	.032[a]
	− .075[a]	.086[a]	.007	.032[a]
	− .076[a]	.086[a]	.007	.031[a]
Disabled	− .073[a]	.028[a]	.070[a]	.017
	− .057[a]	.023[a]	.050[a]	.016
	− .057[a]	.023[a]	.051[a]	.016
Doing housework	.044	.031[a]	.006	− .099[a]
	.033[a]	.018	− .021	− .098[a]
	.033[a]	.018	− .021	− .098[a]

[a]Significant $p < .001$

In general, we only note a slight explanatory power in Table 4 of the three formulated hypotheses. This is remarkable, considering the strong effects which labour-market restrictions, age, and education have on the labour-force status of individuals. A major exception concerns (non-)employment homogamy. It appears from Table 4 that the ascertained (non-)employment homogamy can be explained by the shared restriction and the spouse selection hypotheses. After correcting for the unemployment rate in the region, and educational and age homogamy, the correlation between the residuals drops from 0.031 to 0.000. Employed persons are not married more often to other employed persons. A cumulation of work among married couples does not occur. This conclusion is contrary to the one found by Ultee *et al.* (1988). They did find (non-)employment homogamy in the Netherlands. By introducing shared restrictions and age and educational homogamy, it is possible to completely explain this effect. (Non-)employment homogamy in the Netherlands is attributed to the underlying mutuality of restrictions, and the influence of educational level and age.

The formulated hypotheses do not appear to have any explanatory power for the observed (un)employment homogamy. The residual correlation does not drop. Unemployed persons are married more often to other unemployed persons. For disability for work, we note that a significant part of the relationship can be explained by our hypotheses: a drop from 0.070 to 0.050 (significant for $p < 0.001$). However, it also seems to apply here that disability for work cumulates within one household, with a residual correlation remaining.[8]

Cumulation also occurs for spouses with different labour-force statuses (outside the diagonal cells). Consequently, persons disabled for work and unemployed persons have a higher probability of being married to a person who is disabled for work or unemployed than an employed person. One exception is the combination of a husband who is disabled for work and an employed wife. The occurrence of this combination is entirely explained by our three hypotheses. Moreover, it appears that there is absolutely no relationship in the case of husbands who are disabled for work and who have unemployed wives.

In summary, we establish that (non-)employment homogamy of partners can be explained by an underlying age and educational homogamy, and the labour-market situation in the

region. The observed disabled-for-work homo-gamy can only be slightly explained by these three hypotheses, while no explanation is found for (un)employment homogamy. Unemployed persons are more often married to other unemployed persons.

CONCLUSIONS AND DISCUSSION

In this article, an attempt has been made to give a broader empirical and theoretical basis to the research into the relationship between the labour-force status of partners. Our research question was: 'Is there a relationship between the labour-force status of partners, and, if so, to what extent can this relationship be explained?' In answering this question, we expanded on the article by Ultee et al. (1988) on (un)employment homogamy. Our article contains an important extension by introducing four types of labour-force status. We found a strong relationship between the labour-force status of each spouse within married couples of these four types. Employed persons have a greater probability of having an employed spouse, unemployed persons a greater probability of having an unemployed spouse, and persons disabled for work of having a spouse who is disabled for work.

Three hypotheses were formulated and tested for explaining these relationships. The shared restriction hypothesis explains the relationship by indicating labour-market restrictions similar for both spouses. The spouse selection hypothesis explains the relationship from an underlying educational and age homogamy, and the influencing hypothesis assumes direct influencing via the age and education of the partner.

The testing of these hypotheses was carried out in two stages. Firstly, the analysis by Ultee et al. (1988) for explaining (un)employment homogamy in the USA was replicated for the Netherlands, utilizing detailed information on the regional labour-market. On the basis of this analysis, we find that the Netherlands does have (un)employment homogamy. The shared labour-market restriction and spouse selection hypotheses do not provide any explanation for the relationship between spouses' labour-force statuses. Mutual influencing via the age and education of the spouse does not provide an explanation for the established relationship either.

In a second step, the relationships between the four types of labour-force status were modelled simultaneously, using a multi-nomial logit analysis. An important result is that (non-)-employment homogamy is entirely due to shared labour-market restrictions and spouse selection. These results are contrary to those found by Ultee et al. (1988). Employed persons are not married more often to employed persons, if we control for shared restrictions and spouse selection. For unemployed persons we find that unemployment occurs in couples, and cannot be explained by our three hypotheses. But these hypotheses do partially explain the relationship between the partners' disability for work. In terms of social stratification, this means that a cumulation of unfavourable characteristics in married couples is not only visible by age and educational homogamy, but also by a cumulation of unfavourable labour-force statuses. It is important here that this cumulation does not concern whether partners are employed or not, but rather concerns the cumulation of unemployment and disability for work within married couples.

We conclude that relationships between the labour-force status of married couples remain, if shared restrictions, spouse selection, and mutual influencing are taken into account. More research is required in order to examine the extent to which the ascertained unemployment homogamy and the disabled-for-work homo-gamy are the results of, for example, health homogamy, spouse selection based on ethnicity, or mutuality of social networks. An extension of the research into the relationship of the labour-force status of married couples can be sought in two directions. First, it is preferable to consider labour-market and marital histories using longitudinal data. Secondly, developments in the relationship between the labour-force status of married couples can be examined with cross-sectional data at various points in time. Only with this type of research is it possible to discover whether the Netherlands is characterized by a development of more openness at the individual level and, at the same time, by more closure at the household level.

NOTES

1. The unemployment percentage is defined as the number of unemployed men and women as a percentage of the total number of unemployed persons and gainfully employed men and women.
2. When, out of 'n' couples, in 'a' couples the man and woman are both employed, in 'b' couples the man is employed and the woman is not, in 'c' couples the woman is employed and the man is not, and in 'd' couples neither of the partners is employed (and $a + b + c + d = n$), then the odds ratio is equal to $(a*d)/(b*c)$.
3. Age and education are included as continuous variables. Each type of educational training is classified in effective years of schooling.
4. The parameter estimations for the logit models of age, education, and unemployment are, by definition, the same as those found for the relationship employed versus unemployed in a simple multi-nomial logit analysis. These are presented in Table 4.
5. For a multi-nomial logit analysis see e.g. Maddala, 1983:41.
6. The choice of a different reference category influences the coefficients, but not the estimated probabilities based on the model.
7. We assume that the available choices are independent. Following the suggestion of an anonymous referee, we dropped the independence assumption and re-estimated the models using a nested multi-nomial logit analysis. We found that the correlation between the probabilities estimated using a simple multi-nomial logit analysis and the probabilities estimated using a nested multi-nomial logit analysis is very high ($r = .99$) and the mean difference is less than one per thousand. It did not change any conclusion drawn in this article.
8. In addition to the presented analyses, models have also been estimated in which two-way and three-way interaction terms have been included, and in which non-linearity has been taken into account. In none of the cases does this result in different conclusions with respect to a relationship between the labour-force status of married couples.

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