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Living Arrangement and Capability Deprivation of the Disabled in India

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Abstract

This paper puts forward the argument that the living arrangement of a disabled individual, or her/his marital status in particular, can be taken as a proxy for some very important functionings that constitute her/his well-being, viz. emotions (being able to have attachments to others, able to love etc) and bodily integrity that includes 'opportunity for sexual satisfaction' among others. In the process we contrast our approach to the one that drags the notion of care into the relationship between disabled and non-disabled partners. Based on this conceptual foundation, which draws on the list of essential human functionings constituting freedom in the sense of human flourishing, as articulated by Martha Nussbaum, we examine the quantitative connections between the living arrangement, marital status, and other indicators that roughly correspond to various other relevant functionings. The main source of data is NSS 58th Round (2002), which is supplemented by such other sources as Census 2001.

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The observation that there is a high degree of correlation between disability and poverty or deprivation is rather commonplace. What is lacking is somewhat in-depth understanding of the nature of the connection between disability and various dimensions of deprivation based on quantitative information, even though the importance of this understanding can hardly be overemphasised while designing public policies aiming at capability expansion of the disabled. However, any attempt to fill this gap by specific inquiries cannot avoid the methodological challenges involved in quantification of both disability and deprivation. This paper starts with a conceptual and methodological prelude in Section 1. Some quantitative aspects of disability are presented in Section 2. Section 3 discusses living arrangement and marital status of persons with disability and their quantitative connection with certain other attributes of importance. In Section 4 we present the results of logistic regressions that explain the factors on which the likelihood of positive marital status seems to depend. We conclude in Section 5.

1. Conceptual and methodological prelude

Disability is not a binary concept of all-or-nothing type. There are different types of disability, and within each type the degree of disability may vary in a continuous manner. Undoubtedly, both disability and deprivation are multidimensional, and therefore the correlations between the two can only be meaningfully discussed if both are identified with different dimensions that constitute them. The official discourse on disability in India continues to perceive disability as purely a medical condition, which is to be diagnosed for certification and assessment of eligibility for publicly provided support in the form of aid and appliances and concessions in education and employment. Forms of impairment are distinguished medically, and in most cases for the purpose of entitlement claims, according to such types as visual, communication (i.e. hearing or speech), locomotor and mental. In the process there is very little engagement with the wider

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social and cultural context. A person's ability to function properly depends to a considerable extent on her/his environment. Personal, social and environmental factors are all at play in 'creating' disability. The World Health Organization's International Classification of Functioning, Disability and Health puts forward a functioning based approach for assessing disability which integrates the so-called biomedical and social models of disability. However, the available sources of data may not conform to the methodological requirements of this approach. Our approach is therefore limited to the extent it depends entirely on the available secondary data. The main source of data is NSS 58th Round (2002), which is supplemented by such other sources as Census 2001.

We broadly follow the capability framework here for its conceptual richness in underlining the freedom to do or be as the basis of assessing well-being of an individual. The capability approach assesses an individual's well-being in terms of her functionings and capabilities. While capability refers to what an individual can potentially do or be which she has reason to value, functionings are what she manages to do or be. Being healthy, being well-sheltered, moving about freely, being wellnourished – are all examples of valued functionings. The list of valued functionings can indeed be very large ranging from such elementary functionings as being well-nourished to more complex ones such as having self-respect or taking part in the life of the community. Thus the functioning-based assessment of an individual's well-being is clearly multidimensional and it focuses on the outcome rather than resources or 'inputs'. From the capability perspective, an individual is considered disabled if the impairment places restrictions on her functionings achievement, i.e. she cannot do or be what she values doing or being. Persons with disability suffer from lower income generating capacity as well as lower capacity to convert income or resources into functionings. As Sen (1992) puts it,

Sometimes the same handicaps, such as age or disability or illness, that reduce one's ability to earn an income, can also make it harder to convert income into capability. Often, a high proportion of the poor in the

advanced countries have such handicaps, and the extent of poverty in such countries is substantially underestimated, since it overlooks the "coupling" of income-earning handicap and income-using handicap in generating capability. (p 113)

Even if the lower income generating capacity is compensated for by targeted public policy, the 'conversion handicap' remains a significant problem as the disabled person is not able to lead as good a life as an able-bodied can with exactly the same income. While some factors that determine conversion handicap can be seen as directly amenable to public policy some are not so. Therefore understanding the complexity of the conversion handicap is important in order to design meaningful public policy. We shall argue that the living arrangement and marital status of the disabled person are likely to influence the conversion handicap.

Thus, it is not difficult to see that there is a close correspondence between the capability approach and the social model of disability as the latter conceptualises disability as arising from the interaction of a person's functional status with the physical, cultural and policy environments¹. Combining the capability approach with the social model of disability, it can be claimed that people with functional limitations due to impairment may not be considered as disabled if the environment is so designed that an individual, whatever the nature of her impairment, is able to flourish and fully participate in society.

The paper puts forward the argument that the living arrangement of a disabled individual, or her/his marital status in particular, can be taken as a proxy for some very important functionings that constitute her/his well-being, viz. emotions (being able to have attachments to others, able to love etc) and bodily integrity that includes 'opportunity for sexual satisfaction' among others (Nussbaum, 2000). In the process we contrast our approach to the one that drags the notion of *care* into the relationship between disabled and non-disabled partners. Our approach is rather centred on the idea of realisation of 'opportunity

¹ One of the few attempts to conceptually relate the two is Mitra (2006).

freedom' through participation, where participation refers to the nature and extent of a person's involvement with life satisfaction. Based on this conceptual foundation, which draws on the list of essential human functionings constituting freedom in the sense of human flourishing, as articulated by Martha Nussbaum, we examine the quantitative connections between the living arrangement and other indicators that roughly correspond to various other relevant functionings. The prospect of having a positive marital status (i.e. married and living with a spouse) for a disabled person may depend on a number of factors, including economic status, level of education, occupation and the type of impairment of the partners.

Questions can be raised about the value premise taken here which almost axiomatically accepts a positive connection between marital status and certain valued human functionings. Although we presume such a positive connection for the sake of analysis it does not rule out the possibility of negative outcomes due to asymmetry of power within a marital relationship. The rhetoric of familial concern and protective paternalism can easily camouflage a callous lack of concern or indulgence in practices that go against the agency of the partner. In the Indian context, however, it has been observed that the quality of life of single women in general and widows in particular is much worse compared to women who live with their spouses (Chen, 1998). From the policy point of view, the government is supposed to respond to the market failure in providing insurance to the vulnerable. Where government fails to respond, family or community support is considered to be the only fall back option of the vulnerable. The expectation of reciprocity among the family members makes this organizational form important in alleviating capability deprivation of some form.

In discussions of marital relationships where one of the partners is disabled, the notion of "care" invariably gets entangled in the relationship which is typically constructed as a binary between care-givers and care-receivers. In this conventional representation, the sexual and emotional aspects of a relationship are often subsumed under the 'need for care' in which the disabled partner is represented as only a

care-receiver and the nondisabled partner as a care-giver (Smith, 2009). This kind of representation tends to ignore the positive functionings that are achieved by both the partners through marital relationship. The focus on the specific functionings mentioned earlier, by implication, rejects the tendency to assume that nondisabled partners experience only burden. Nonetheless, the scope of the paper remains limited as it does not address the question of gender justice within marital relationship.

2. Some quantitative aspects of disability in India

The National Sample Survey (NSS) 2002 estimated that 8.4 per cent households in rural areas and 6.1 per cent households in urban areas had at least one disabled person in the household, and the estimated number of persons with any disability in India, based on the NSS data again, turned out to be 1.85 crore. According to Census 2001, the number was slightly larger - 2.2 crore. However, both the agencies seem to have underestimated the prevalence and the actual number. and according to some estimate, the number of disabled persons in India could be somewhere between 4 and 9 crore (World Bank, 2007). Both NSS and Census have been criticised on the ground that one is not sure what aspects of disability are in fact captured by them (Mitra and Sambamoorthi, 2006; Jeffery and Singal, 2008). Even if they were clear on this, there would still be a possible underestimation for under-reporting at the household level.

Even though the overall estimate of NSS falls short of the actual prevalence, there is no reason why the estimated rural-urban or gender composition would be biased in either direction. The prevalence rate is higher in rural than in urban areas and among men than among women. What is to be noted is that the gender difference in terms of certain basic functioning achievements is higher among the disabled than in the general population. For instance, while the illiteracy rate among the disabled females was 64 per cent, it was 43 per cent among the disabled males, according to NSS 58th Round (2002). Among different categories of disability, the conditions of the mentally

disabled persons are the worst in terms of all the standard functionings².

3. Marital status and living arrangement

The prospect of having a positive marital status (i.e. married and living with a spouse) for a disabled person may depend on a number of factors, including economic status, level of education, occupation and the type of disability. Although there is evidence of education (general as well as vocational)-induced achievements in occupational status for the disabled persons in comparison to the non-disabled, there is little evidence on how higher educational status and associated occupational achievements make difference in their marital status.

Table 1 presents the distributions of disabled persons as well as the general population in India by marital status for males and females. As one would expect, in terms of marital status, the disabled persons on average differ substantially from the general population. The percentage of 'ever married' among the disabled was 76.4 as against 84.3 per cent for the general population, which shows that the probability of entering into a marital relationship is significantly lower among the disabled compared to the general population. What is noticeable among the disabled persons is the significant difference between the two sexes. While the percentage of never married among the females (17.1) was substantially lower than among the males (28.1), a very high percentage of the 'ever married' among the females was widowed or divorced/separated.

Table 1: Marital status of the disabled and general population (18 years and above)

| | General population | | | Disabled population | | | |
|--------------------|--------------------|--------|-------|---------------------|--------|-------|--|
| | Male | Female | Total | Male | Female | Total | |
| Never married | 22.7 | 8.5 | 15.7 | 28.1 | 17.1 | 23.6 | |
| Currently married | 73.1 | 77.5 | 75.3 | 61.3 | 41.6 | 53.2 | |
| Widowed | 3.7 | 13.0 | 8.2 | 9.0 | 38.1 | 21.0 | |
| Divorced/separated | 0.5 | 1.0 | 0.7 | 1.6 | 3.2 | 2.2 | |

Source: Estimated from NSS 58th round unit-record data (schedules 1.0 and 26)

While 41.3 per cent of the disabled females aged 18 years of above were either widowed or divorced or separated, only 10.6 per cent in the case of disabled males belong to this category. If we compare the widowed among the disabled females with the widowed females in the general category, the difference seems to be rather sharp. One might wonder why so many disabled females were reported to be widows. In the absence of further evidence we can only speculate about two possible explanations. First, the average age gap between the spouses might be wider among the disabled than in the general population, as such women are at a disadvantage in the marriage market. But more importantly, anecdotal evidence suggests that a good number of disabled women are abandoned by their husbands, and these women might report themselves as widows to avoid being despised and stigmatized by others. Therefore we have good reason to suspect that the 'widowed' category includes a good number of such women. In any case, such a high percentage of widowed women indicates that a significant proportion of the disabled women suffer from conversion handicap.

Table 2: Marital status of disabled persons with different types of disability and general populations (aged 18 years and above)

| | Male | | | | Female | | | |
|--------------------|------------------|----------------------|---------|------------------------|------------------|----------------------|---------|------------------------|
| | Never married | Currently married | Widowed | Divorced/ separated | Never married | Currently married | Widowed | Divorced/ separated |
| Mental | 56.2 | 35.0 | 3.1 | 5.7 | 40.1 | 34.4 | 15.6 | 9.8 |
| Visual | 16.2 | 64.6 | 17.8 | 1.5 | 6.5 | 31.6 | 60.7 | 1.2 |
| Hearing | 10.3 | 74.6 | 14.3 | 0.9 | 4.3 | 46.3 | 47.5 | 1.9 |
| Speech | 46.1 | 48.4 | 4.2 | 1.3 | 33.3 | 48.2 | 14.5 | 4.0 |
| Locomotor | 26.7 | 65.2 | 7.1 | 1.0 | 18.4 | 49.7 | 29.0 | 3.0 |
| Multiple | 36.8 | 51.3 | 10.1 | 1.7 | 26.2 | 27.3 | 42.4 | 4.0 |
| All disabled | 28.1 | 61.3 | 9.0 | 1.6 | 17.1 | 41.6 | 38.1 | 3.2 |
| General population | 22.7 | 73.3 | 3.7 | 0.5 | 8.5 | 77.5 | 13.0 | 1.0 |

Source: Estimated from NSS 58th round unit-record data (schedule 26)

Further, the marital status varies significantly across different categories of disabled persons, which is revealed by Table 2. Almost 65 per cent of the mentally disabled are either never

We do not intend to present here any quantitative description of different aspects of relative deprivation of disabled persons. See World Bank (2007) for an elaborate picture of relative deprivation, and Mitra and Sambamoorthi (2006) for employment situation.

married or widowed/divorced/separated. Somewhat similar is the situation, although a little better, for persons having speech disability. Compared to these two categories, persons with disability in vision and hearing are not so much deprived of conjugal life.

If one looks at the percentage of 'ever married' among the disabled in different age groups, one does not find unusually large gender differences (Table 3). Among the disabled aged around 40, the percentages of ever married among males and females are almost the same (86.2 for males and 86.7 for females). What is to be noticed is that as they cross the age of 50 years the male-female difference again increases. It is unlikely that, at an age above 50, more females get married than males. Therefore, this difference at higher ages might be indicative of higher mortality among the 'never married' females compared to the 'ever married'.

Table 3: Age group wise distribution of marital status for males and females in disabled and general population (aged 18 years and above)

| | | Ma | ale | | Female | | | | | |
|---------------------|---------------------|-------------------|---------|------------------------|------------------|-------------------|---------|------------------------|--|--|
| | Never married | Currently married | Widowed | Divorced/ separated | Never married | Currently married | Widowed | Divorced/ separated | | |
| | Disabled population | | | | | | | | | |
| 18-29 years | 74.3 | 24.3 | 0.4 | 1.1 | 57.8 | 36.5 | 1.3 | 4.3 | | |
| 30-39 years | 26.5 | 69.2 | 1.9 | 2.4 | 24.1 | 62.0 | 5.9 | 8.0 | | |
| 40-49 years | 13.8 | 79.3 | 4.1 | 2.8 | 13.3 | 66.8 | 15.5 | 4.3 | | |
| 50-59 years | 8.4 | 81.1 | 8.9 | 1.7 | 4.8 | 57.8 | 34.9 | 2.5 | | |
| 60 years & above | 3.5 | 72.6 | 23.0 | 0.9 | 1.0 | 25.9 | 72.1 | 1.0 | | |
| Total | 28.1 | 61.3 | 9.0 | 1.6 | 17.1 | 41.6 | 38.1 | 3.2 | | |
| | | | Genera | l populatio | n | | | | | |
| 18-29 years | 58.5 | 40.9 | 0.3 | 0.3 | 22.3 | 75.7 | 0.9 | 1.1 | | |
| 30-39 years | 5.8 | 92.6 | 1.1 | 0.6 | 1.5 | 93.8 | 3.4 | 1.3 | | |
| 40-49 years | 1.8 | 95.8 | 2.1 | 0.4 | 0.9 | 87.2 | 11.0 | 1.0 | | |
| 50-59 years | 1.5 | 92.4 | 5.7 | 0.4 | 0.8 | 74.8 | 23.4 | 1.1 | | |
| 60 years & above | 1.1 | 79.3 | 19.0 | 0.6 | 1.7 | 39.4 | 58.4 | 0.5 | | |
| Total | 22.7 | 73.3 | 3.7 | 0.4 | 8.5 | 77.5 | 13.0 | 1.0 | | |

Source: Estimated from NSS 58th round unit-record data (schedules 1.0 and 26)

The most striking difference between the disabled females and the females from the general population is observed in the age group 18-29 years. While the three-fourths of the females from the general population in that age group are currently married, only 36.5 per cent of the disabled females in the same age group are currently married. We already noted the high percentage of widowed among the disabled females. What is remarkable is that in all age groups the percentage of widows among the disabled females is higher than that among the females in the general population. The gender difference in widowhood turns out to be much sharper among the disabled than in the general population. The percentage of widowed among females shots up much faster than that among males as they age (Table 3).

Does marital status vary across economic classes? Of course there is no compelling reason to believe that it should, which is somewhat confirmed by the distribution of non-disabled persons of different marital status across MPCE (Monthly Per Capita Consumption Expenditure) classes.

Table 4: Distribution of marital status of disabled and general population for each MPCE quintiles (aged 18 years and above)

| MPCE | | Disabled population | | | | General population | | | |
|--------------------------|------------------|---------------------|---------|------------------------|------------------|--------------------|---------|------------------------|--|
| quintile | Never married | Currently married | Widowed | Divorced/ separated | Never married | Currently married | Widowed | Divorced/ separated | |
| Poorest | 20.5 | 55.2 | 21.8 | 2.5 | 9.6 | 80.2 | 9.3 | 0.9 | |
| 2 nd Quintile | 22.5 | 54.7 | 20.6 | 2.4 | 12.7 | 78.1 | 8.4 | 0.8 | |
| Middle | 23.6 | 53.3 | 21.1 | 2.1 | 15.2 | 75.8 | 8.1 | 0.9 | |
| 4 th Quintile | 26.4 | 50.2 | 21.2 | 2.2 | 16.8 | 74.0 | 8.6 | 0.6 | |
| Richest | 28.3 | 50.1 | 19.9 | 1.8 | 21.6 | 70.8 | 7.1 | 0.6 | |
| All | 23.6 | 53.2 | 21.0 | 2.2 | 15.7 | 75.3 | 8.2 | 0.7 | |

Source: Estimated from NSS 58th round unit-record data (schedules 1.0 and 26)

Table 4 shows that, while the proportions of widowed and divorced/separated in the disabled population are by and large uniform across all MPCE quintiles, they are not so in the case of 'never married'. As one moves from the bottom to the top quintile one notices that while the proportion of never married increases, that of currently married slightly decreases, which

means that the disabled in the relatively better off households are slightly less likely to get married. This particular pattern is observed in the general population as well. There is no obvious explanation for this.

As one would expect, the marital status of a disabled person is clearly associated with whether or not he/she is earning or able to work. In Table 5 the percentages of 'ever married' in different occupational categories are shown for the disabled as well as the general population. 'Poor' and 'Rich' in the table refer to the bottom 30 per cent and top 10 per cent of the households, respectively, in terms of MPCE. Interestingly, while his status as an earner has stronger influence on the marital status of a man, in the case of a woman her marital status does not seem to be influenced significantly by her status as income earner. However, the disabled women who are not able to work due to disability are less likely to be ever married. This particular aspect points towards the dark side of the so called family support. Women's ability to work is what is most valued in a prospective marital contract.

Table 5: Percentage of 'ever married' in different occupational categories (aged 18 years & above)

| | Po | Poor | | ich | A | All |
|-------------------------------------------------|-----------|-----------|------|--------|------|--------|
| | Male | Female | Male | Female | Male | Female |
| Di | isabled p | opulation | | | | |
| Earning – self-employed or regular wage earners | 88.6 | 82.2 | 78.8 | 80.6 | 83.9 | 76.7 |
| Earning – labourer | 83.1 | 87.1 | 48.0 | 76.9 | 78.6 | 86.3 |
| Engaged/capable in work but not earning | 53. 2 | 83.5 | 27.8 | 82.3 | 46.2 | 84.2 |
| Not working due to disability | 72.1 | 83.5 | 67.5 | 72.6 | 68.9 | 80.9 |
| Others | 70.7 | 88.8 | 67.6 | 76.4 | 68.2 | 84.7 |
| Total | 75.5 | 84.6 | 68.4 | 77.9 | 71.9 | 82.9 |
| G | eneral po | pulation | | | | |
| Earning – self-employed or regular wage earners | 93.8 | 95.4 | 84.5 | 80.8 | 88.9 | 87.5 |
| Earning – labourer | 85.2 | 96.5 | 73.7 | 89.3 | 79.8 | 94.6 |
| Engaged/capable in work but not earning | 64.5 | 95.2 | 41.7 | 94.0 | 53.0 | 94.1 |
| Not working due to disability | 64.3 | 84.5 | 68.8 | 77.6 | 65.8 | 82.7 |
| Others | 69.0 | 88.0 | 40.5 | 39.7 | 49.4 | 65.8 |
| Total | 84.1 | 95.0 | 71.3 | 84.8 | 77.4 | 91.5 |

Source: Estimated from NSS 58th round unit-record data (schedules 1.0 and 26)

As far as the living arrangement of the disabled is concerned, there is a large male-female difference. While a high percentage of disabled men have the advantage of living with their spouses (58.6), the disabled women are not so lucky – only 38.7 per cent of them live with their spouses. A greater proportion of females than males live all alone (Table 6).

Table 6: Living arrangement of disabled persons (aged 18 years and above)

| | Poor (bottom 30% MPCE) | | Rich (Top 1 | I0% MPCE) | ALL | | |
|----------------|------------------------|--------|-------------|-----------|------|--------|--|
| | Male | Female | Male | Female | Male | Female | |
| Alone1.4 | 3.7 | 8.3 | 6.3 | 2.8 | 5.7 | | |
| With spouse | 62.5 | 39.1 | 52.5 | 37.8 | 58.6 | 38.7 | |
| Without spouse | 36.0 | 57.2 | 39.3 | 55.9 | 38.6 | 55.6 | |
| with parents | 20.9 | 15.8 | 22.5 | 18.6 | 23.4 | 16.6 | |
| with children | 7.8 | 31.3 | 8.4 | 25.3 | 7.5 | 29.5 | |
| with others | 7.3 | 10.1 | 8.4 | 11.9 | 7.7 | 9.6 | |

Source: Estimated from NSS 58th round unit-record data (schedule 26)

In this section we have tried to explore the possibility of association between the marital status of a disabled person and certain other features which may throw some light on the question of how the marriage market works in the case of disabled persons. Even if we ignore the asymmetric power relation that may prevail between the partners and assume reciprocity as the basis of a marital contract, it is clear that the ability to work makes a big difference in achieving the desired functionings through marital relationship. The tentative observations presented in this section will be further examined through logistic regressions.

4. Results of logistic regressions

To examine empirically how different individual-level characteristics of a disabled person including his/her economic status and place of residence are statistically associated with his/her marital status, we have estimated a logistic regression. The dependent variable that we have considered is the marital status of the disabled person, and like other estimates we have restricted our sample to include only those aged 18 years and above. The independent variables that we have considered

are sex, age group, working-earning status, education, type of disability, extent of disability, per capita monthly expenditure of the household in which the disabled person lives and place of residence of the disabled person. Sex is included to see if marital status favours one gender over the other. Age group is included in the regression mainly as a confounding variable since the likelihood of having an ever married marital status must be monotonically increasing with age. We have excluded individuals below 18 years since the legal minimum age of marriage is 18 years and ideally we should not expect to see an individual aged below 18 years having 'married' status. Since ability to work and earning capacity are two important traits that are likely to be considered most important in the marriage market, especially for the disabled persons, we have included an independent variable working-earning status which combines both working capability and earning capacity of the disabled person. The variable 'working-earning' status is classified into four categories, namely earn-high (which is used as a reference category in the logistic regression), work-not earn and not able to work (due to disability)3 and others. Apart from its own importance as an important individual trait in the marriage market in general, education can be additionally important for a disabled person as having higher education expands his/her job opportunities and increases likelihood to earn his/her own income. A disabled person's acceptability or lack of it in the marriage market is expected to be dependent on his/her degree of disability since the ability to live a conjugal life depends on the nature and severity of disability. Therefore, in order to capture the effect of the type and severity of disability on the marital status, we have included both the type of disability and extent of disability as independent variables. The monthly per capita consumption expenditure of the household where the disable person lives is included to capture disabled person's current economic status, since consumption expenditure is considered a good proxy for permanent income. We have made log transformation of the consumption expenditure to remove the positive skewness in its distribution. Place of residence (sector) is included to examine if living in the rural or urban areas makes any significant difference in the marital status of a disabled person. The results of the logistic regression are presented in Table 7. The odds favouring 'marital status of the disabled person is ever married are higher (OR=1.99) if the disabled person is a female than a male. Since the age group variable is included as a confounding variable, we do not attempt to provide any explanation for it. In comparison to earn high disabled persons, odds are lower for disabled who earn low (OR=0.96 but not significant), who work but do not earn (OR=0.57), those who are not able to work due to disability (OR=0.23) and lowest for others (OR=0.19). This clearly indicates that earning, irrespective of its level, makes a difference in the marital status of a disabled person. In comparison to the illiterate disabled persons, odds are higher for disabled persons with primary education (OR= 0.96). Although secondary and high secondary (OR=0.92) and above high secondary (OR=0.88) show lower odds ratios in comparison to illiterate disabled person, neither of them is statistically significant. This is an indication that a disabled person's literacy status makes a difference in his/her marital status but no significant difference is observed across disabled persons with different levels of education. Since it is generally observed that hearing disability restricts one's ability to live a normal life to a much lesser degree in comparison to other forms of disability, we have considered 'hearing disability' as a reference category and tried to see what difference other types of disability make to marital status of a disabled person. The results show that in comparison to hearing disability, odds are lower for locomotor disability (OR=0.70) followed by visual disability (OR = 0.59), speech

³ The category earn-high includes those working in the household enterprise (self-employed) own account worker, working in household enterprise (self-employed) employer, working as regular salaried/wage employee, rentiers, pensioners, remittance recipients, etc. The category earn-low includes casual wage labourers in public and other types of work, beggars and prostitutes. The category 'working but not earning' includes those who are working as helpers (or unpaid family workers) in household enterprise, attending educational institutions, attending domestic duties only attending domestic duties and also engaged in free collection of goods (vegetables, roots, firewood, cattle feed etc.), sewing, tailoring, weaving, etc. for household use.

disability (OR=0.34) and lowest for mental disability (OR =0.31) and multiple disability (OR=0.31). However, it should be noted that data used for the analysis are what were then observed at the time of the survey and there is no way to know if the disability and other characteristics (such as education, occupation etc.) observed at the time of survey were the same as that at the time of marriage. As far as the extent of disability is concerned, in comparison to a disabled who can take selfcare without aid/appliance, odds are lower for a disabled who cannot take self-care without aid/appliance (OR=0.86). The odds are not significant for the categories can take self-care with only aid/appliance, aid/appliance was never tried or unavailable. A less than unity value of the odds ratio (0.83) for log of monthly per capita consumption expenditure indicates that having higher economic status reduces the odds favouring ever married marital status. Odds favouring marital status is ever married is lower for the disabled persons living in the urban areas compared to the rural areas (OR=0.73).

Regression results presented in Table 7 clearly shows an association between sex and marital status of a disabled person and such an association does indicate a favourable situation for the females as the odds favouring a disabled person having ever married marital status is higher for the females in comparison to the males. It was interesting to observe that there are individual-level characteristics other than sex which show strong association with marital status of a disabled person. It may be interesting to examine if other individual characteristics have similar influences on marital status for the male and female disabled persons. For example, the effect of education or occupation or economic status on the marriage prospect of a disabled person may be different for a male disabled person and for a female disabled person.

The results of the Logistic regression where this connection is investigated are presented in Table 8. We have used the same set of dependent and independent variables except sex. The odds ratios are found to be higher for the male disabled persons in comparison to the female disabled persons for a given age group. This should not be interpreted as male

disabled person's higher likelihood to be married with age than a female disabled person. In the Indian context the average age at marriage is always found to be lower for females than for males. Therefore, moving from a lower age group to a higher age group shows greater changes in marital status in favour of 'ever married' for the males than for the females. In comparison to earn-high group, for the male disabled persons the odds are lower for work-not earn (OR=0.30), not able to work (OR=0.25) and others (OR=0.21) groups but not significantly higher or lower for earn-low group. For the females. the odds are higher for the earn-low (OR=1.63) and work-not earn (OR=1.82) groups but lower for not able to work (OR=0.41) and others (OR=0.33) groups. It is evident that capacity to work irrespective of the earning status favours females' ever married marital status or marriage prospect more than that of males but for the male disabled persons both capacity to work as well as earning level matter. It is worth noticing the contrasting effects of education on ever married status for the male and female disabled persons. Being literate increases a male's prospect of favouring ever married marital status but odds are higher for disabled male with *primary* education (OR=1.51) than disabled males with secondary and high secondary (OR=1.26) and above high secondary education (OR=1.28). Being literate and having more education monotonically reduces ever married status for the female disabled persons as in comparison to the *illiterate* reference group, odds favouring ever married marital status are 0.73, 0.51 and 0.49 for the primary, secondary and high secondary and above high secondary educational groups respectively. The real reason behind this pattern is not obvious. While higher education can increase a disabled person's prospect of getting a job and capacity to earn his/her own livelihood, having higher education can make him/her more conscious and careful about his/her physical limitation to live a normal married life and at the same time entails more empowerment and gives confidence to live a life without seeking support from others. Moreover, a disabled person's preference and sense of vulnerability also changes with higher education. A decision and an opportunity to get married must be an outcome of all these complex factors.

Table 7: Results of the Logistic regression

Dependent variable: Marital status of the disabled person = 1 if ever married = 0 if never married

| Independent variable | Odds Ratio | P>z |
|-----------------------------------------------------|------------------|-------|
| Sex (Ref=Male) | • | |
| Female | 1.99 | 0.000 |
| Age Group (Ref=18-29 years) | | |
| 30-39 years | 6.74 | 0.000 |
| 40-49 years | 15.85 | 0.000 |
| 50-59 years | 39.59 | 0.000 |
| 60 years & above | 174.74 | 0.000 |
| Working-earning (Ref= earn-high) | | |
| earn-low | 0.96 | 0.535 |
| work-not earn | 0.57 | 0.000 |
| not able to work | 0.23 | 0.000 |
| others | 0.19 | 0.000 |
| Education (Ref=Illiterate) | | |
| primary | 1.16 | 0.000 |
| second & high second | 0.92 | 0.190 |
| above high second | 0.88 | 0.114 |
| Type of disability (Ref= hearing) | | |
| Mental | 0.31 | 0.000 |
| Visual | 0.59 | 0.000 |
| Speech | 0.34 | 0.000 |
| Locomotor | 0.70 | 0.000 |
| Multiple | 0.31 | 0.000 |
| Extent of Disability (Ref= can take self-care witho | ut aid/appliance |) |
| cannot take self-care without aid/appliance | 0.86 | 0.023 |
| can take self-care with only aid/appliance | 0.97 | 0.545 |
| aid/appliance not tried/available | 1.06 | 0.339 |
| InMCE | 0.83 | 0.000 |
| Sector (Ref = Rural) | | |
| Urban | 0.73 | 0.000 |

Note: Sample size = 56145, Wald χ^2_{19} =7374.76, Pseudo R²= 0.42. Source: Estimated from the unit-record NSS data (58th round).

Table 8: Results of the Logistic Regression

= 1 if ever married Dependent variable: Marital status of the disabled person

= 0 if never married

| Independent Variables | Odds ratio MALE ¹ | Odds ratio FEMALE ² |
|-------------------------------------------------|-------------------------------------|-----------------------------------|
| Age Group (Ref=18-29 years) | - | |
| 30-39 years | 8.49*** | 4.50*** |
| 40-49 years | 20.22*** | 9.86*** |
| 50-59 years | 41.80*** | 35.65*** |
| 60 years & above | 150.39*** | 267.97*** |
| Working-earning (Ref= earn-high) | • | |
| earn-low | 0.98 | 1.63** |
| work-not earn | 0.30*** | 1.82*** |
| not able to work | 0.25*** | 0.41*** |
| Others | 0.21*** | 0.33*** |
| Education (Ref=Illiterate) | - | |
| primary | 1.51*** | 0.73*** |
| second & high second | 1.26*** | 0.51*** |
| above high second | 1.28** | 0.49*** |
| type of disability (Ref= hearing) | | |
| mental | 0.29*** | 0.37*** |
| visual | 0.65*** | 0.52*** |
| speech | 0.39*** | 0.25*** |
| locomotor | 0.78*** | 0.57*** |
| multiple | 0.38*** | 0.22*** |
| Extent of Disability (Ref= can take self care v | vithout aid/appliance | ·) |
| cannot take self-care without aid/appliance | 0.81*** | 0.97 |
| can take self-care with only aid/appliance | 0.96 | 0.98 |
| aid/appliance not tried/available | 1.15* | 0.90 |
| InMCE | 0.89*** | 0.77*** |
| Sector (Ref = Rural) | | |
| Urban | 0.70*** | 0.78*** |

Note: 1 Sample size = 33206, Wald \div^2_{19} = 5216.80, Pseudo R^2 =0.4241; 2 Sample size = 22939, Wald \div^2_{19} = 2270.64, Pseudo R^2 =0.4225; * : significant at 10% level, ** : significant at 5% level, *** : significant at 1% level Source: Estimated from the unit-record NSS data (58th round)

In comparison to hearing disability (which is considered least restrictive for a person's life in comparison to other forms of disability), odds are lower for all other forms of disability for both the males and females. Except mental disability, odds are lower for females than males indicating that a female's marriage prospect gets more affected than a male's for any given type of disability. The effect of the extent of disability on the marital status seems to follow distinct patterns for the male and female disabled persons. For example, in comparison to a male disabled person who can take self-care without aid/appliance, odds are lower for a male disabled person who cannot take self-care without aid/appliance, but for other categories of extent of disability, no statistically significant association is observed. In case of female disabled persons none of the extent of disability categories is significant. Having better economic status reduces the odds favouring ever married marital status for both male and female disabled persons but it reduces more for the female disabled than for the male disabled persons. Similarly in comparison to rural areas, living in the urban areas lowers the odds for both male and female disabled persons but it lowers more for the males.

5. Conclusion

That a disabled person faces great disadvantage in the marriage market can be easily understood, but the nature of such disadvantage and how it varies across different types of disabilities and in presence of other characteristics of the individual and the household to which she belongs is not clearly understood. This paper has made an attempt to fill this gap. We find that the nature and extent of disadvantage follow distinct patterns among men and women. Disabled women are a lot more likely than men not to live with their spouses and an overwhelming proportion of them are widowed or separated. This seems to be the most vulnerable group among all the disabled persons. We also find that capacity to work irrespective of the earning status favours the marriage prospect of females more than that of males, but for the male disabled persons both capacity to work as well as earning level matter. More interestingly, higher levels of education reduce the prospect of

the married status for both males and females and it reduces more for the females. Only micro-qualitative kind of inquiry can throw some light on the real reason behind such systematic patterns. While higher education can increase a disabled person's prospect to get a job and capacity to earn his/her own livelihood, it gives her more freedom to choose between a married life that is likely to be affected by the lack of mutual respect and living an unmarried life. Findings of this kind help us think about the appropriate design of public policies.

References

- Chen, Martha Alter (1998)(ed) Widows in India, Sage, New Delhi.
- Mitra, Sophie (2006) 'The Capability Approach and Disability', *Journal of Disability Policy Studies*, 16(4), pp 236-247.
- Mitra, Sophie and U Sambamoorthi (2006) 'Employment of Persons with Disabilities: Evidence from the National Sample Survey', *Economic and Political Weekly*, January 21. Pp 199-203.
- Mitra, Sophie and U Sambamoorthi (2006) 'Disability Estimates in India: What the Census and NSS Tell Us', *Economic & Political Weekly*, September 23, pp 4022-26.
- Nussbaum, Martha (2000) Women and Human Development: The Capabilities Approach, Cambridge University Press, Cambridge, MA.
- Smith, Sarah Anne (2009) Love, sex, and disability: The ethics and politics of care in intimate relationship, Ph.D. thesis, Ohio State University.
- World Bank (2007) *People with Disabilities in India: From Commitments to Outcomes*, Human Development Unit, South Asia Region.

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