# Female Sexual Dysfunction in Multiple Sclerosis: A Review

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Changes in sexual functions are very common among women with advanced multiple sclerosis but occur also in early and mild cases. Decreased sexual desire as well as decreased or absent lubrication are almost as common as diminished orgasmic capacity, changes in orgasmic quality or anorgasmia. Changes in sexual functions correlate both to neurological symptoms from the sacral segments, such as sensory dysfunction in the genital area or weakness of the pelvic muscles, and to bladder and bowel dysfunction. However, disability in itself and a number of psychological and social factors may explain the problems but also gives clues to the treatment.

KEY WORDS: multiple sclerosis; female; libido; lubrication; orgasm.

# INTRODUCTION

Multiple sclerosis is characterized by a widespread occurrence of lesions in the central nervous system giving rise to disseminated neurological symptoms. The early symptoms are often very mild. Typical clinical symptoms are visual defects, localized sensory symptoms such as numbness, paraesthesiaes and dysaesthesia, weakness or loss of control over limbs and incoordination. Manifestations of the disease are often followed by conspicious improvements so that remissions and relapses are the striking features of the disorder. In many cases the later clinical picture is one of progressive disability. Multiple sclerosis strikes individuals in the prime of life between the ages of 20 and 40 years, more often women than men. Prognosis is uncertain, a factor that is most stressful, as neither the patient nor the physician can predict whether the patient will remain mildly affected, or will be confined to a wheelchair or even bed-ridden.

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# FREQUENCY OF SEXUAL DYSFUNCTION

Almost all patients in advanced phases of the disease suffer from sexual dysfunction. In a study of 134 females (1) it was noticed that sexual life had changed for 72% of them. In 53 of the women with unsatisfying or extinguished sexual life loss of orgasm was notified as the main problem by 33% of the women and loss of libido by 27%. Similar figures were reported in other investigations (2-5). In a recent study changes in sexual functions in 47 women with advanced multiple sclerosis were described in more details (6). Twenty-eight (59.6%) of the women reported decreased sexual desire and seventeen (36.2%) decreased lubrication. Five (10.6%) further women did not know if they lubricated or not. Eighteen women (38.3%) reported diminished orgasmic capacity, and six (12.8%) further women had never had an orgasm. Sensory dysfunction in the genital area was experienced by 61.7% of the women and 76.6% had weakness of the pelvic muscles.

# SEXUAL PROBLEMS IN EARLY AND MILD CASES OF MULTIPLE SCLEROSIS

Sexual dysfunction is common even in early and mild cases of multiple sclerosis. It may be the presenting symptom. In a study of 25 females aged 20-42 with a low handicap score (grade 1-2 on a 6-grade scale) sexual problems were reported by 13 of the women (7-8). Sensory symptoms seemed to be the most important reason for sexual dysfunction in these women. None of the 13 women had suffered from any sexual problems before the start of the multiple sclerosis. Nine of them complained of decreased libido and 9 had difficulty in achieving orgasm. Because of severe external dysaesthesia three patients reported that during a certain period they could not bear direct genital contact from their partner. Five other women had vaginal dyspareunia. Three further women complained of lack of vaginal lubrication. Some of the women were able to achieve orgasm despite intensive sensory symptoms. The sexual symptoms began in most cases rather abruptly. The dysaesthesia was of a maximum intensity from the beginning of an episode of neurological symptoms, but disappeared fairly rapidly as is usual in multiple sclerosis.

#### SEXUAL DYSFUNCTION AND BLADDER/BOWEL DYSFUNCTION

Since corresponding parts of the autonomic nervous system are subserving urinary and genital functions, bladder problems such as urgency and incontinence are fairly common in women with multiple sclerosis suffering from sex-

ual dysfunction (3, 7-11). Minderhoud et al (3) found that 73.9% of their female patients under the age of 50 had disturbances of sexual functions. Fiftynine and one-half percent of the patients suffered to a greater or lesser degree from disturbances of micturation and 52.7% complained of irregularities in their defecation pattern. Sixteen and eight-tenths percent were sometimes incontinent of faeces. In a study of women with advanced multiple sclerosis (6), 66% had bowel troubles and 89.4% had bladder dysfunction. The changes in sexual functions in the women in this study correlated both to neurological symptoms from the sacral segments, such as weakness of the pelvic floor, and to bladder and bowel dysfunction.

# SPECIFIC SEXOLOGICAL ISSUES IN MULTIPLE SCLEROSIS PATIENTS

## Sexual Desire

Most patients report a diminished sexual desire which they associate with the disease. Some patients have experienced a temporary decrease in libido associated with the disease. In certain cases a stronger sexual desire has been observed. In those cases where this phenomenon is transitory and concurrent with an episode of new symptoms, the "hypersexuality" might result from a cerebral lesion. However, patients suggest themselves that the increase in sex drive might have been due partly to changes in their partner relationships and partly to the illness, in that the disability from the disease had meant that love and sex had become more important to them.

# Lubrication

Many women experience a delay and some decrease in lubrication. Since lubrication is an important counterpart to erection in males and erectile impotence is very common in male multiple sclerosis patients, a decrease in lubrication could be expected to result from a lesion to those parts of the spinal cord subserving the lubrication mechanism. Many women notice erection of the clitoris during sexual arousal. This erection may be lost in multiple sclerosis. It has also been observed in multiple sclerosis that loss of lubrication was associated with loss of menstruation (6). When there is a temporary decrease in lubrication, this could be the result of a spinal cord lesion but also due to treatment with drugs. Impotence is very common in males taking a number of prescription drugs, such as antihypertensive and antidepressive drugs and histamine-2 receptor antagonists (12). However, lubrication is a physiological phe-

nomenon that is almost completely overlooked by the medical profession and a decrease in lubrication has almost never been reported as an adverse drug reaction.

# Orgasmic Capacity and Quality

Other important symptoms of sexual dysfunction in females with multiple sclerosis are deterioration of orgasmic capacity, intensity and quality. In most cases the orgasmic sensations are reduced. They become more short-lasting, less intense and/or less agreeable. There may be a decrease in orgasmic capacity. The changes may be temporary. However, an orgasmic improvement has also been noticed (6). The orgasms may be more easily triggered, enabling the women to have more orgasms. In some women the sensations can be intensified, i.e., they can become longer lasting, stronger and/or more pleasant. In these women a good orgasmic quality has significantly been correlated to noticed erections of the clitoris. Antidepressive medication may lead to anorgasmia in many women taking such drugs (12).

#### Sexual Intercourse and Masturbation

In the study of Hulter and Lundberg (6), 41.3% of the 47 women reported that during the past month they did not have sexual intercourse at all. Thirty and four-tenths percent had sexual intercourse 1-2 times and 28.3% 3-10 times. Regarding the frequency of sexual intercourse during the past month compared with that a month before the onset of the illness, 73.9% of the women stated that intercourse now was less frequent. The reduction in frequency was said to be attributable to practical problems connected with the illness, the partner, a decrease in sexual desire, the fact that sex had become less important, or disturbances by small children. A few women reported an increased frequency of intercourse. When comparing masturbation during the past month with that a month before the start of the disease, one woman reported more frequent and 20 women (43.5%) less frequent masturbation. In 7 women there were no changes, and 18 women had never masturbated regularly.

#### CLINICAL AND LABORATORY EXAMINATION

The diagnosis of a neurogenic cause of the sexual dysfunction in multiple sclerosis patients is based on the clinical picture with acute commencement of the problems concommitant with other typical neurological symptoms and signs. Pathological bulbocavernosal or anal sphincter reflexes, decreased genital sensibility or abnormal pudendal evoced potentials (13-15) as well as pathological urodynamic findings or reduced urethral sensitivity thresholds (9-10, 15-18) give further indications of involvement of those parts of the nervous system controlling the pelvic floor structures.

# SEXUAL FUNCTIONING SCORE AND DISABILITY SCORES

Sexual dysfunction can be described in physiological terms such as lack of lubrication and orgasm, decrease in libido a s o. However, it can also be described in more global sexual function scales. Such a scale was constructed by Szasz et al (19). They found that 45% of their patients (2/3 females and 1/3 males) were less sexually active or inactive since the onset of the disease and 27% of the patients were concerned about the situation. However, the authors did not report females and males separately.

Disability in multiple sclerosis patients is often reported in function scales. One important scale is the EDSS (expanded disability status scale according to Kurtzke (10)). With this scale the neurological impairment in each patient is rated in 20 steps. 0 means normal neurological examination, 6.5 means constant bilateral assistance of canes, crutches or braces required to walk about 20 meters without resting, 7.0 means unable to walk beyond about 5 meters even with aid. Here the patient is essentially restricted to a wheelchair and wheels herself in a standard wheelchair some 12 hours a day. 9.5 means a patient totally helpless in bed who is also unable to communicate effectively or eat/swallow.

In the study of Hulter and Lundberg (6) statistically significant correlation was found between the lower EDSS scored group and cohabitation. All marital separations among the group of women with higher scores were claimed to be related to problems emanating from the disease. Despite the fact that more of the women in the group with lower EDSS scores lived with a sexual partner and were sexually more active, both with masturbation and intercourse, they had more complaints about their sexual functions. This group of women had been aware of their clitorial erections and more of them had experienced an orgasm within the past year compared with the other group. Also, there was a higher employment rate in the lower scored group.

The more negative judgements of sexual functions by less afflicted women can emanate from the fairly new situation of not being healthy. The perception is fresh of not being able to perform the way they used to. The women still carry images of pleasures they were able to have before the onset of the disease. The more severely afflicted adjust to a new role, as a disabled, nondemanding and grateful patient. They experience divorces and enjoy the less regular encounters in a different way. The life-style of a professional woman

probably increases the possibilities of getting in contact with a potential partner. The greater the physical disability, the smaller the chance of keeping her professional job. The difficulties in moving around and meeting people increase. Lacking cohabitation or realistic opportunities of sexual communication with a partner will alter the impressions of the meetings she might experience.

Another reason for the differences could be the euphoric mood changes that are notable in many patients with advanced multiple sclerosis. The patients often appear remarkably optimistic and joyful despite their increasingly restricted personal situation (21).

Five women out of 47 in the study of Hulter and Lundberg (6) reported increased sexual enjoyment. When asked what they imagined were the reasons for this, they suggested that it was partly attributable to their relationships and partly to the re-evaluation of important things in life in favour of love and sex. It is thus possible that a woman who earlier in life was sexually active, competent and satisfied, as a result of changes in perspective and of sexual opportunities, ends up being less sexually active and competent but nevertheless satisfied.

### TREATMENT

As mentioned, sexual dysfunction in multiple sclerosis patients may often be transitory. Therefore, in early and mild cases only general counselling about the disease itself and the nature of the sexual problems is necessary. It is our experience that most women find talking about their sexual problems a positive experience. However, very few patients do actually ask for advice.

Both the women and their spouses have to adjust to the impairments of physical abilities by coping processes. To permit such an adjustment to new realities, both the patient and her partner need realistic information from the physician. The patients need an opportunity to express their real feelings in an open manner. It might ease up in the relationship to invite talking about the situation, to give information, to give the possibilities of asking specific questions and to express emotions. Couples have difficulties expressing to one another the feelings the disease is bringing them. People generally tend to have an asexual view of a woman in a wheelchair. It is our impression that these women are happy to be looked upon as real, living persons. It seems reassuring to many of them to be approached as human beings with sexual needs and pleasures as well as sexual difficulties, even if they are sitting in a wheelchair. The risks of intruding in a negative way in the personal lives of disabled patients might have been overestimated in the past.

Asking a patient about sexual problems does not oblige the professional care-giver to present an elegant solution to the problem. Many of the sexual

dysfunctions that develop during the course of a disease like multiple sclerosis most likely cannot be cured in any medical or psychological way. However, there might be facts about sexual functions and specific suggestions that can be offered by the professionals that will ease up a sexual problem.

Certain patients can be instructed to use specific sexual stimulations, such as a vibrator, specific coital positions, or alternative methods of sexual activity. In cases of motor dysfunction of the pelvic floor muscles, these muscles can be trained. Sensory disturbances may be treated. Carbamazepine can be used as a remedy against paroxysmal pains, baclofene against spasticity and pains. These two drugs do not increase sexual dysfunction. On the contrary, sometimes they have been reported to increase sexual desire. Advices about contraception may also be of importance since many patients may no longer be able to use their previous methods.

In more advanced cases the problems of sexual counselling and sexual rehabilitation may be very intricate. Difficulty in communication with the partner, rejection from the partner, and in some cases, sexual overdemand may constitute problems in the rehabilitation process. Lack of sexual education and knowledge is also a problem in many countries.

It is of great importance that all categories of personnel working with disabled persons are fully aware of the fact that sexual dysfunction may constitute a major problem for many women with multiple sclerosis. The fact that more severely afflicted women may complain less, reminds us not to judge the patient's experiences from her bodily functions, but to listen to her own view of the situation.

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