

PATIENT DEPRESSIVE SYMPTOMS AND RECIPROCITY INFLUENCE DISTRESS IN THE CAREGIVER OF PATIENTS WITH MIGRAINE: INSIGHTS FROM THE MIDEAR OBSERVATIONAL COHORT STUDY

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Background. As awareness of migraine disability is becoming higher, the recognition of the pivotal role of caregivers of people with migraine and their burden is still scarce. We aimed to investigate the factors influencing the distress of informal caregivers of patients affected by high-frequency or chronic migraine with depressive symptoms.

Methods. All consecutive adult patients with high-frequency or chronic migraine and depressive symptoms were considered, along with their caregivers. Sociodemographic characteristics and the average number of weekly hours spent together were assessed in patients and their caregivers (dyads). In patients, we evaluated monthly migraine days, monthly acute medications, pain intensity, migraine-related disability, the composite 4D score on migraine burden, and depressive symptoms (Patient Health Questionnaire-9-PHQ-9). Caregivers filled in the Relative Stress Scale (RSS). The mutuality scale (MS) was also collected in the dyads.

Results. 154 dyads (308 participants) were enrolled (patients aged 42.6 years, SD 12.7; 80.5% female; and their caregivers aged 48.1 years, SD 12.2; 36.4% female). The mean shared reported time was 89.7, SD 29.7 hours per week. In patients, PHQ-9 scores were higher among females ($p=0.017$) and in those with higher disability scores (MIDAS $p<0.001$; HIT-6 $p=0.025$; 4D scale $p=0.043$), while MMDs were not directly related ($p=0.356$). The RSS score in caregivers was 20.6 (SD 10.9). Among caregivers' features, the reciprocity subdomain of the MS was inversely related ($p=0.009$) to the perceived stress (RSS).The MS total scores and subdomains (p consistently <0.05) were highly related in the dyad. A positive relation was observed between caregiver RSS and patient PHQ-9 ($r=0.197$; $p=0.014$), 4D ($r=0.234$; $p=0.004$), and MIDAS ($r=0.207$; $p=0.010$) scores, while a non-significant trend was observed for MMDs ($r=0.157$; $p=0.052$). Finally, when both caregiver and patient characteristics were included, the caregiver reciprocity MS subdomain ($p < 0.001$) and PHQ scores ($p = 0.004$) were the only factors associated with RSS scores.

Conclusions. The MIDEAR study highlighted the elevated perceived stress of caregivers of patients with migraine. Among its possible determinants, low reciprocity, a higher multidimensional migraine burden, and more severe depressive symptoms in patients worsen the caregivers' psychological health.

The MIDEAR study group.