Targeted research project (V5-2028), Duration: November 1, 2020 - October 31, 2022

Subsidised by Ministry of Agriculture, Forestry and Food of the Republic of Slovenia and Public Agency for Research of the Republic of Slovenia

Response of farming families to the consequences of accidents at work and occupational diseases

Summary of the final report

Work-related injury and occupational disease (WIOD) records available worldwide show that the farming occupation, which is mainly family farming, is one of the most dangerous and risky occupations. Despite the significant contribution of WIOD to mortality and disability - the vulnerability of farmers and farm workers - interest in studying this phenomenon has only recently emerged. However, there is a paucity of research that addresses the consequences of WIOD from the perspective of farmers themselves and their family members, including the continuation and development of farms, taking into account their working conditions and social security. Thus, the research conducted in this project was exploratory-investigative and did not aim to confirm hypotheses, but to discover possible relationships and structures between phenomena that could form the basis for hypotheses and be tested by further investigation.

Against this background, the aim of the present project was to investigate the extent, characteristics, and causes of WIOD, as well as the economic costs of WIOD, and to answer the question of how members of farming families cope with their own physical and mental impairments resulting from WIOD or those of their family members, what social support they can access, and how farmers and other stakeholders in the agricultural system view the idea of establishing a specialised service – Farm Relief Service (FRS) - as a possible form of public-private partnership to help farmers fill the labour gap created by WIOD.

Using a variety of methodological approaches, ranging from analysis of statistical data to analysis of survey data to data from semi-structured interviews and focus group discussion (FG), we arrived at the following results/ findings:

- The number of officially registered accidents on farms is underestimated. Existing statistics only record occupational accidents of people who are covered by social insurance. However, there are many people who work on their farms in their free time or after retirement, including people without social insurance. Their work accidents are not registered. As far as officially registered work accidents are concerned, the number of people with the status of a farmer has remained quite stable during the observation period 2011-2020, although the number of people who are socially insured through the title of a farmer has been decreasing. However, the number of work accidents of persons living on farms but employed in other non-agricultural activities is increasing.
- Older men working in livestock are most at risk for occupational injuries. The most common injuries involve the limbs (limb fractures), especially the hands. Injuries to persons of agricultural status are more severe than those to persons of other occupational status who live on farms. The other most common causes of injury are work with machinery (tractors, various types of saws), work in the forest and with animals.
- No less than 90% of respondents report having experienced health problems in the past year, especially musculoskeletal problems, while one-fifth report mood disorders and 18% report work-related injuries. At the same time, 60% of survey participants are satisfied or very satisfied with their health, which indicates that many farmers deny their health problems and do not seek help.
- More than 80% of respondents had experienced at least one or more problems in the past year directly related to excessive stress, which can lead to deterioration of mental, physical, and social health. The following were cited as causes of excessive stress: an exaggerated sense of personal responsibility for the success of the farm, long and unpredictable working hours, low income in

relation to the work performed, lack of financial resources for investment, excessive effort to achieve work results, multitasking and high workload, heavy physical work, long forced postures and repetitive movements, lack of relaxation and rest, high priority of work, and perfectionism.

- The cost of absenteeism at the individual farm level is estimated at €2,860 and the cost of sick leave up to 30 days (absenteeism) at €953. Despite the high proportion of farmers reporting health problems, only 16% of farmers report using short-term sick leave.
- Participants in semi-structured interviews like their work, but it is physically and mentally demanding. They are exposed to many stressors, risks, and hazards associated with mechanisation, working with animals, working in the forest, chemicals, working in bad weather, long forced postures, and extensive paperwork. What they do not see is that the risky and dangerous work is associated with increasing lone working with the absence of others.
- Most of the participating farms do not have a safety statement with risk assessment. Participants believe that they are responsible for their own safety on the farm and that not all hazards can be avoided despite all caution. They acknowledge that they themselves contribute to the hazards by "taking shortcuts," not using protective equipment, and using improvised, repaired tractors and machinery, mainly due to lack of time, money, and labour. However, participants point to the need to raise awareness of health and safety on farms and to have access to appropriate equipment for safe work.
- Farmers are poorly informed about pension and disability insurance rules and rights. Many of them are not covered by social insurance because of their low income from farming and the economic needs of the farm (investments), and they are not able to do so through contributions from e.g. supplementary activities on the farms. Women farmers are particularly disadvantaged in this regard. Their initiative to improve their social situation through proposals to change legislation is not supported by their chamber. As a result, some opt for commercial forms of insurance, which are less secure and reliable. Farmers also report poorer access to health services.
- The difficulties and stress that some women farmers face in balancing family and work, especially those who face weak social support networks during motherhood and when caring for elderly family members, can jeopardise their health and lead to poor, strained, and even conflictual relationships between family members that can threaten production and the financial stability of the farm. Such experiences of women farmers highlight the social changes that have occurred in recent decades, such as the demographic shrinkage of farm families and the weakening of informal social support networks in farming communities, which negatively impact the quality of life in these communities.
- Poor work-life balance, overwork, lack of rest and leisure often lead to poor decisions and workrelated injuries and illnesses. Members of farm families do not take enough time to relax and holiday, many do not take breaks and rest at work, do not get enough sleep, which makes them tired, burned out, and more prone to accidents and illness, and makes them socially isolated and lonely. In addition to lack of time, lack of money is also a common reason why farmers rarely take vacations. Some farmers have never taken a holiday in their entire working lives, which they justify by the commitment and responsibility they have or feel for their farm. Family members who are employed off the farm also spend most of their free time and holiday working on the farm, making them more susceptible to burnout and excessive stress, and thus more vulnerable to injury and illness.
- WIOD occurred in all family farms observed, in men and women, young and old. Some cases were so severe that they resulted in loss of work and income for months or even a year. Family members (spouses and children) are the first to take over or help in a WIOD case, followed by relatives, friends, and neighbours. They are bound by the "rules of the game," i.e., the strong moral obligations typical of a farming community. In households with a larger number of members, obtaining replacement labour is not a major problem. In the case of WIOD, the reorganisation of work on the farm depends in particular on who is injured or sick. Life and work on the farm change the most when the male farm manager is injured or sick. With their "new" responsibilities on the farm, wives often maintain their previous work on and off the farm, increasing the risk to their health due to the increased workload, as they are exposed to more stress and strain that can

lead to tension (ambivalence) or even conflict in family relationships over a longer period of time. In such cases, farmers rarely seek help and confide in others.

- Farmers, especially neighbours, help each other in times of crisis. This support is also part of the rules of moral economy that apply in the farm community. Thirty years ago, this form of support was much more common than it is today, when the number of members in farm families is decreasing due to the low birth rate and farmers are in the minority in the village. The decline of neighbourly support in the farming community, which is also related to the use of machinery, contributes to the individualistic character of modern agriculture and weakens the independent status and working conditions of individual farmers. They increasingly work alone, isolated and lonely, which makes them more vulnerable to excessive stress, burnout and accidents.
- Farmers and farm women have different views on hiring non-family labour to meet labour needs on their farms. Few hire labour to bridge the labour shortage in the case of WIOD, but also in general. Some believe that they can do everything themselves or with the help of their family members, and do not consider the involvement of such labour in the operation of their farms appropriate or useful. For others, non-family labour is welcome, if not essential, to the success of their farms. However, the latter also have reservations about this type of labour: they question their honesty, reliability and competence, do not want to take responsibility for their safety, see the financial costs as an obstacle and, last but not least, their unavailability.
- Farmers cope with the consequences of WIOD in different ways. Family and community labour shortages and a strong work ethic often force them to work sick and injured or end their treatment and recovery prematurely. The poor safety culture remains unchanged for most, while safety awareness is increasing for some. Some cope with the loss of income due to WIOD through savings, while others are forced to sell parts of their herds or convert or change their production. If they are financially able to do so and replacement labour is available in their area, they hire it. In the absence of family support, (single) farmers are forced to give up farming. Few farmers are aware of social rights and social transfer opportunities that could help them overcome the financial difficulties caused by the loss of income. Some farmers believe that their farms will close in the future because they do too much hard and risky work for too little pay.
- The FRS has a long tradition in parts of Europe. In addition to providing substitute labour in case of illness or injury, it also provides help with household chores and substitute labour for farmers and farm women during maternity and parental leave, education, participation in community activities, recreation, and leisure. Different forms of organisation and types of financing for this service have been developed in different European countries. They are provided within the framework of machinery rings, business cooperatives, local communities, private companies, and humanitarian organisations. They are financed either by health and social insurance, by special accident insurance, by farmers' contributions and membership fees, or by government subsidies.
- Formal replacement support services in the case of WIOD, as they are known in other European countries, are largely unknown to farmers. Once they become familiar with the organisation and financial framework of such a service, e.g. in Finland, most find the idea of introducing such a service in our environment acceptable. It would come in handy, not only in case of illness and injury, but also during holidays. However, they see problems in the lack of available manpower and the inability to pay for such a service themselves. They see solutions to the financial and staffing obstacles at government level. Those who think it could be organised see several possibilities, either through private companies or the national employment service, or through the agricultural advisory service, or through the existing machinery rings. However, some feel that farmers themselves should take the initiative to set up such a service within their own associations and professional bodies, even though the degree of integration between them is low.
- Representatives of the Agricultural Advisory Service and the Slovenian Rural Youth Association call for an urgent discussion on FRS. A service must be found that meets the needs of farmers and that they can afford financially.