

EONS Cancer Nursing Index 2020-2022©

National profile: Bosnia

Introduction

In the [RECaN project](#) EONS highlighted important differences in cancer nursing across Europe. The EONS Cancer Nursing Index (ECNI) was developed by the [EONS Advocacy Working Group](#) to illustrate the development and status of this profession in Europe. The index (with scores from 0-100) covers the following dimensions: Education and Career Development, Patient and Occupational Safety, Recognition, Working Conditions and Impact and Workforce statistics. The results from the ECNI 2020 have been used to highlight the importance and impact the recognition of European cancer nursing. More information on ECNI 2020 including national profiles for each country could be found [here](#)

The ECNI 2022 also include data on staffing levels and cancer nurses' experiences from the covid-19 pandemic. However, these data are not included in the national profiles since no comparison data from 2020 is available. These data will be presented separately.

The ECNI 2022 focuses more on the experiences from the responding cancer nurses' workplaces (rather than the national perspective), allowing for the great regional and local variety indicated in the ECNI 2020 data. The Index is based on data from the following sources:

1. EONS Survey on Patient and Occupational Safety (anonymous survey among cancer nurses, 2020 and 2022 respectively)
2. Work force statistics (obtained from ec.europe.eu/Eurostat and OECD in 2020). When the ECNI 2022 were completed, no updates had been published so both ECNI 2020 and 2022 include the same scores.

A scoring system was developed to reflect the level of development for the different Index dimensions/items. For items with a variety of responses from the same country, the most frequently reported response was used. The purpose of the Index is primarily not to rank some countries as better than others, moreover to illustrate cancer nursing profiles, differences and areas in need of development. The Index could be used to aid the development of cancer nursing in each country as well as for general European progress.

The ECNI offers a snapshot of the current status in cancer nursing across Europe, reported by the profession. The results largely depend on number of and profiles of responses from each country.

Dimension/item	Maximum score	Mean general score 2022 (min-max)	Score 2020	Score 2022	Comments
OVERALL SCORES	100	55 (19-84)	36	27	
EDUCATION AND CAREER DEVELOPMENT (5 items presented below)	23	10 (0-23)	0	3	
Specialist education on university level	5		0	0	
EONS Cancer Nursing Framework recognized and supported	5		0	3	
Master programs in cancer nursing	4		0	0	
Advanced cancer nursing roles established	5		0	0	
Professors in cancer nursing	4		0	0	
PATIENT AND OCCUPATIONAL SAFETY (8 items presented below)	36	20 (0-33)	12	0	
Safety guidelines (hazardous drugs) available	5		5	0	
Guidelines during pregnancy (hazardous drugs)	5		0	0	
Pregnant and/or breastfeeding women assigned other tasks that don't involve direct contact with cytotoxic/radioactive drugs	5		2	0	
Systematic testing for occupational exposure (surface swipes)	3		0	0	
Speak-up or whistle blower policy implemented for all members of staff	3		0	0	
Access to cytotoxic spillage kit and PPE	5		5	0	

Formal training before administering cytotoxic drugs	5		0	0	
Nurses not preparing cytotoxic drugs	5		0	0	
WORKING CONDITIONS AND THE IMPACT ON CANCER CARE (4 items presented below)	20	14 (9-17)	19	13	
Level of adherence to European Working Time Directive (EWTD)	5		4	5	
Risk of negative consequences if asking for alternative duties pregnancy/breast feeding	5		5	0	
To what extent hospital beds are closed due to cancer nursing shortages	5		5	4	
To what extent cancer treatments were delayed due to cancer nursing	5		5	4	
RECOGNITION (4 items presented below)	18	10 (0-15)	5	5	
Does the country have a cancer nursing society?	5		5	0	
Does the country have a national cancer plan that includes nursing care?	3		0	0	
Does your workplace/center have Board positions dedicated for cancer nursing?	5		0	5	
To what extent is nurse-led cancer care implemented in your workplace/center?	5		0	0	
WORK FORCE STATISTICS (1 item)	3	1 (0-3)	0	0	
Number of practicing nurses/1000 citizens (www.europe.eu/Eurostat and OECD)	3		0	0	

Strengths and recommendations for improvements

Overall, Bosnia total score was 27. Only two counties in the Index scored lower: Romania (total score 22) and Lithuania (total score 19).

Patient and Occupational safety are major concerns in Bosnia as none of the responding Bosnian cancer nurses reported safety measures listed within this dimension to be implemented in their country. Consequently, all of them reported that cancer nurses in Bosnia run risks of negative consequences if they ask for alternative duties, that don't involve direct contact with hazardous drugs during pregnancy/ breast-feeding. Moreover, cancer nurses in Bosnia report that they prepare hazardous drugs every week, whereas in majority of European countries those tasks are performed by pharmacists in strictly controlled environment.

With regards to Education and Career Development, the results indicate that major efforts are needed to improve access to education at all levels. As a consequence, advanced level nursing roles and nurse-led care are not implemented.

Bosnia remains one of three countries in the Index, that were reported not to have a national cancer nursing society. EONS would be more than happy to support any initiative to develop such society.

Finally, Bosnia has lower number of practicing nurses compared with most countries in the Index. Despite this, cancer nurses in Bosnia report that hospital beds rarely close or that cancer treatments rarely are delayed due to nursing shortage.

