INTERNATIONAL VARIATION IN CHILD HEALTH SURVEILLANCE AND ACUTE CARE PRACTICES: A MIXED METHODS ANALYSIS

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Differences in pathways to medical attention and timely diagnosis for symptomatic children may explain some of the variation in childhood cancer survival rates observed between some countries. One aim of the BENCHISTA Project (International Benchmarking of Childhood Cancer Survival by Stage) is to assess current evidence in child health surveillance and acute care practices in relation to early diagnosis of childhood cancers and to perform a descriptive comparative analysis of child health practices across the participating countries (n=27). BENCHISTA is a collaboration between 65 population-based cancer registries that collects standardised data on tumour stage at diagnosis for six childhood solid tumours.

Method/Project description

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A comprehensive literature review of articles published in the last 10 years from five databases

Terms including *paediatrics/child, diagnosis,*

Two independent reviewers screened abstracts for full

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Quality assessment of

Sistema Socio Sanitario

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ombardia

was conducted based on the Preferred Reporting Items for Systematic Reviews and Meta-Analyses (PRISMA) statement.

Semi-structured questionnaire was created on a

secure platform to collect standardised data on

child health practices within each country.

cancer, population surveillance, among others were used to create the search strategy.

Focused in routine

surveillance check-ups

(frequency and type of

practitioner) and routes to

medical attention for acute

symptoms.

text selection and data extraction; a third reviewer (paediatric oncology expert) resolved conflicts.

Addressed to one general

practitioner and one general

paediatrician to provide

relevant information on their

country's national health

policies and practices.

the articles selected for data extraction was ensured.

Information about required paediatric training of frontline practitioners was also collected.

Results



Pathways to diagnosis, alarm signs/symptoms of childhood cancer and factors affecting the timely diagnosis of childhood illnesses.

28 studies evidenced disparities in the routes used to detect serious illnesses including cancer (during routine child checks, screening of children with a predisposition syndrome or at hospital due to urgent or out-ofhours assessment).

f 19 studies evidenced differences in symptom awareness and healthcare-seeking behaviours within population subgroups.

27 studies explored factors affecting timely diagnosis of serious illnesses including lack of knowledge of risks associated with specific symptoms and the impact it may cause to the referral pathway, scarcity of guidance on high-risk signs/symptoms and lack of paediatric training of front-line personnel providing childhood routine and acute care, among others.

The questionnaire was piloted, and vocabulary refined. To date, it contains 51 answers from practitioners from 25 countries.

Noticeable variation in child health surveillance practices, particularly in the number of universally offered check-ups with physical examination provided in children under 5 years old (median: 10, range: 2-21) was found. Validation against national guidance is performed.

Discussion

There is evident variation between countries in frequency of routine child health surveillance and in access to assessment by a paediatrician for children with acute symptoms. Similar variation in available guidelines to raise awareness of childhood cancer 'alarm symptoms' exists. These data will be used to interpret any variation in tumour stage at diagnosis revealed by the BENCHISTA Project.

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Acknowledgments:

- Expert panel at Nottingham University (Professor of Paediatric Oncology Dr. David Walker; NIHR Doctoral Research Fellow / Paediatric Registrar Dr. Dhurgsharna Shanmugavadivel; and Clinical Associate Professor Dr. Madhumita Dandapani) for their contribution.
- The data used in this project have been generated during the treatment and care of patients.







