

## Cartas al Director

**Cancer-related knowledge and health status among cancer survivors in Portugal****Conocimiento sobre el cáncer y estado de salud en sobrevivientes de cáncer en Portugal**

To the Editor:

In the last few years, a striking increase in the number of cancer survivors (CS) has been observed, mainly due to the increment in the number of new cases of cancer being diagnosed and the use of more effective treatments. This fact brings new challenges for health services, since CS often experience late and long-term adverse effects of cancer and its treatments,<sup>1</sup> including second primary cancers, cardiovascular complications, depression, pain or fatigue, which may contribute for a poorer perceived health status and a greater use of health care.<sup>2</sup> In addition, a life event such as cancer can be a teachable moment, providing many opportunities to improve health knowledge and behaviours. However, the information needs of CS are mainly treatment-related, with a marginal interest in surveillance and health information,<sup>3</sup> which can hamper the adoption of healthier behaviours, although CS are, in general, more likely to seek cancer information than individuals without this disease (NC).<sup>4</sup>

In this context, we compared CS and NC regarding cancer-related knowledge, health status, health care use and lifestyles. We selected CS and sex-, age- and education-matched (1:4) NC, among participants of a national population-based cross-sectional study.<sup>5</sup> A total of 39 CS, corresponding to a prevalence of 1.4%, and 156 NC were included in this study. Data was collected through face-to-face interviews, using a structured questionnaire, and the effect of a previous diagnosis of cancer was quantified through prevalence ratios (PR), and respective 95% confidence intervals (95% CI).

Figure 1 depicts the perception of potential consequences of cancer, health status and health care use among CS and NC. Except for “impaired working capacity”, CS tended to identify more often all health problems as potential consequences of cancer, with significant differences for “cancer recurrence” (PR=1.16; 95%CI: 1.04-1.28). They also reported a poorer health status (PR=2.75; 95%CI:1.82-4.17) and greater prevalence of cardiovascular diseases (PR=5.33; 95%CI:1.96-14.52), hypertension (PR=1.95; 95%CI: 1.28-2.97), depression (PR=3.67; 95%CI: 1.75-7.69) and anxiety (PR=5.14; 95%CI: 2.81-9.42). Consumption of medication (PR=1.14, 95%CI: 1.01-1.28), annual screening for breast (PR=2.93; 95%CI: 1.92-4.46), cervix (PR=2.02; 95%CI: 1.22-3.34) and prostate cancers (PR=3.12; 95%CI: 1.36-7.16) were more frequent among CS.

Regarding the most important behaviour for cancer prevention, CS tended to refer more frequently “regular check-ups”, “healthy diet” and “not drinking”, and less often “not smoking” and “blood analysis”, albeit these associations were not statistically significant. Additionally, no statistically significant differences were observed between CS and NC regarding smoking, alcohol intake, consumption of fruits and/or vegetables, and physical activity.

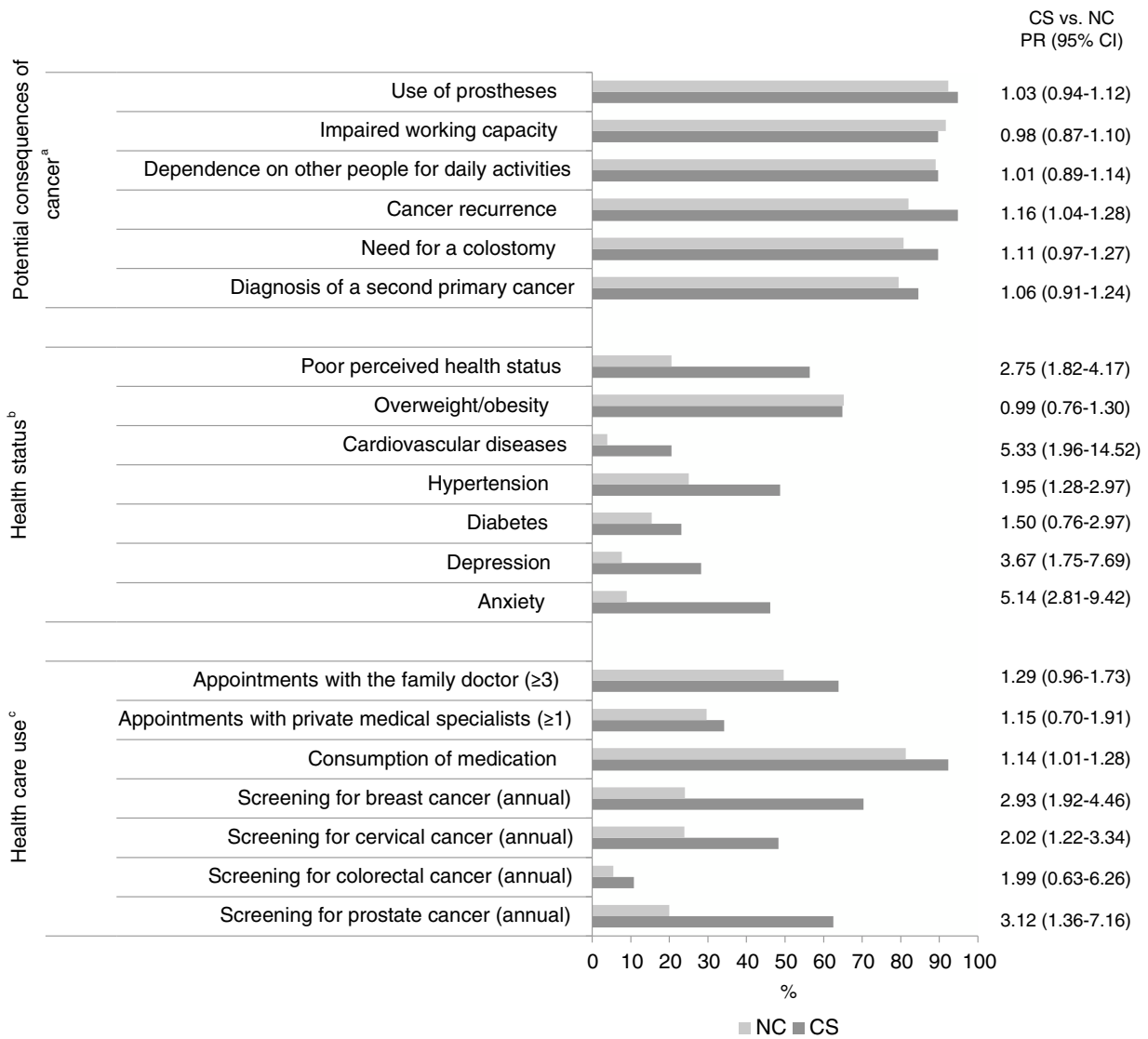
In conclusion, this exploratory investigation has shown that, among CS, there is margin for improvement of knowledge about oncological diseases, and health promotion interventions targeting this specific population are needed. It also confirmed a worse health status, and a higher use of health care resources among CS, particularly concerning the consumption of medication and cancer screening. Hence, the present work provides a benchmark to design and evaluate the effectiveness of knowledge-raising activities targeting CS, to understand the burden of cancer survivorship, and to allocate appropriate resources for national cancer survivorship care plans.

**Authorship contributions**

A. Rute Costa collaborated in the analysis and interpretation of the data and has written the first draft of the letter. P. Moura-Ferreira participated in the design of the survey, reviewed and revised the letter critically for important intellectual content. N. Lunet participated in the design of the survey, defined the specific objectives and strategy of data analysis for this report, collaborated in the analysis and interpretation of the data, and reviewed the letter critically for important intellectual content. All authors approved the final version of the manuscript.

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CI, confidence interval; CS, cancer survivors; PR, prevalence ratio; NC, non-cancer participants.

<sup>a</sup> Participants were questioned whether each health problem could occur as a result of a cancer (for data analysis the options “do not know” and “did not answer” were recoded as “no”).

<sup>b</sup> Perceived health status was aggregated in “very poor or poor” and “fair, good or very good”. Overweight/obesity was defined if body mass index (self-reported weight/height<sup>2</sup>) was ≥25.0 Kg/m<sup>2</sup>. Diagnosis by a doctor of major cardiovascular diseases (namely stroke, myocardial infarction, or heart failure), hypertension, diabetes, depression and anxiety was also assessed.

<sup>c</sup> Appointments with the family doctor in the primary health care unit in the last 12 months were dichotomized using the median number as cut-off (≥3); appointments with medical specialists in the private sector were categorized as none or ≥1. The use of any prescribed medication was considered if the participants reported consumption within the previous 12 months. The annual use of cancer screening was assessed for breast (mammography testing, among women aged ≥30 years), cervix (cervical cytology testing, among all women), colon and rectum (faecal occult blood test and/or colonoscopy, among women and men aged ≥40 years), and prostate cancers (prostate-specific antigen and/or digital rectal examinations, among men aged ≥40 years).

**Figure 1.** Perception of potential consequences of cancer, health status and health care use, among cancer survivors and non-cancer participants.

## Conflicts of interest

None.

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## Adecuación de las intervenciones selectivas en eventos multitudinarios



### Suitability of selective interventions in multitudinal events

Sr. Director:

Recientemente, la Dirección General de Salud Pública del Departamento de Salud de Aragón ha emitido una circular con las medidas a adoptar para la prevención de la hepatitis por virus de la hepatitis A ante situaciones como los denominados «Encuentros del Orgullo», dirigida específicamente a la población masculina que mantiene sexo con hombres (HSH)<sup>1</sup>.

Sabemos que este tipo de campañas han sido promocionadas en otros países de la Unión Europea, pero se desconoce su impacto. Por otra parte, a pesar de la evidencia disponible en cuanto a los HSH como población en situación de vulnerabilidad por la realización de prácticas de riesgo y la efectividad de la vacuna, surgen una serie de cuestiones que obligan a la reflexión antes de iniciar estas medidas.

La campaña va dirigida a los HSH que van a asistir a un Encuentro del Orgullo. Queda patente que desconocen las realidades de las personas que viven la diversidad afectivo-sexual en general<sup>2</sup>, y de la población de HSH en particular, puesto que en el contexto aragonés no se han producido Encuentros del Orgullo con el marcado carácter mercantilista, festivo y multitudinario que se conoce en Madrid u otras ciudades europeas. Por ello, si la campaña va dirigida a la población HSH que decida asistir a tales eventos en la capital madrileña, sería más oportuno enfocar la campaña bajo dicha premisa y adecuar su puesta en marcha a las fechas del evento.

Además, la idea de esta campaña parece asumir la inexistencia de herramientas personales o comunitarias de prevención, y que determinadas prácticas sexuales se realizan siempre en estos eventos, culpabilizando e incluso criminalizando a estas personas<sup>3</sup> al afirmar que la mejor estrategia de prevención es la vacuna, y no la decisión de no realizar prácticas sexuales seguras. De la circular se desprende que la población asistente al Encuentro del Orgullo se encuentra *per se* en una situación de mayor riesgo que el resto de la población, y que en este evento se propicia el mantener relaciones sexuales de riesgo con mayor frecuencia que en otro tipo de eventos de carácter festivo. Diferentes investigaciones han evidenciado la existencia de condicionantes de la realización de prácticas

sexuales de riesgo más allá de la asistencia a eventos<sup>4-6</sup>, que sería necesario priorizar desde un enfoque de salud pública y de promoción de la salud, con la búsqueda de resultados efectivos a medio y largo plazo, como la educación para la salud afectivo-sexual desde un enfoque de género<sup>7,8</sup>.

A pesar de que se conocen las desigualdades en salud de las personas LGTB en comparación con la población heterosexual, relacionadas entre otros con el estigma, con frecuencia se desconocen y hasta se ignoran las necesidades específicas de salud de esta población<sup>9</sup>.

Por último, debe hacerse una reflexión a la luz de la situación de desabastecimiento en la que se encuentra en este momento la comunidad autónoma de Aragón<sup>10</sup>, y quizás por ello se propone dispensar de modo gratuito únicamente la primera dosis, pero sorprende que no se plantea acción alguna que contemple el seguimiento y la comprobación del desarrollo de inmunidad frente al virus.

Ante ambas situaciones, desabastecimiento y desarrollo de la campaña, se puede correr el riesgo de dejar desprotegida a parte de la población, tanto a la valorada en las consultas de vacunas con indicación de vacunación como al resto de la población potencialmente asistente a este evento y otros multitudinarios, que también puede encontrarse en riesgo de contraer esta enfermedad por los mecanismos de transmisión fecal-oral, cuyo riesgo no se ha valorado.

### Contribuciones de autoría

Las tres personas firmantes han concebido y redactado la carta, han aprobado su versión final y son responsables de ella.

### Financiación

Ninguna.

### Conflicto de intereses

Ninguno.