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Joint Research Centre

JRC-ENCR quality check software: its use in practice

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*Cancer registry data – collection and comparability
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European
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JRC-ENCR quality check software

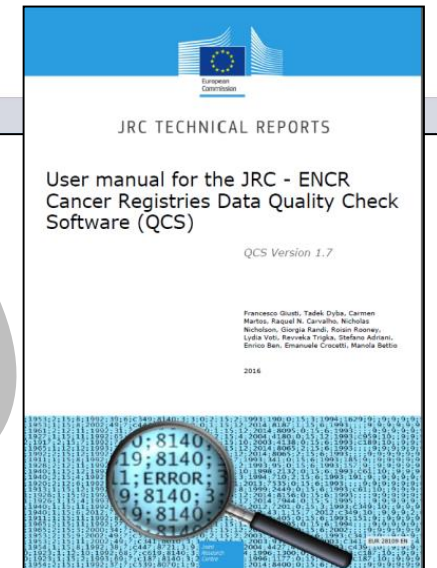
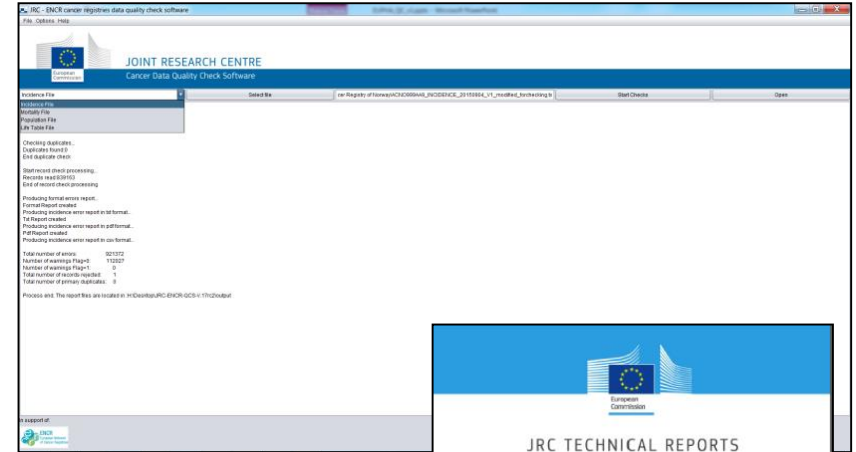
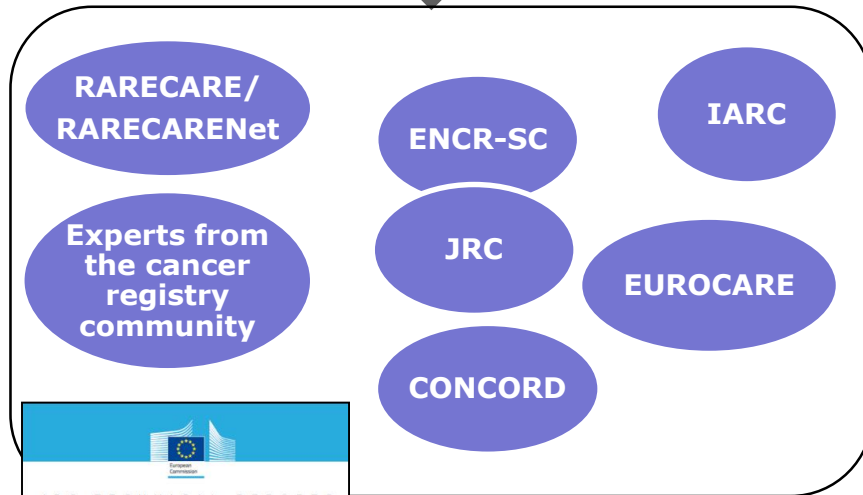
1. Why the JRC-ENCR quality check software (QCS) was developed?
2. What does the JRC-ENCR QCS check?
3. How to use it in practice?
4. How to interpret the outputs?

1. Why the JRC-ENCR quality check software (QCS) was developed?

- ❑ The reliability and utility of information provided by population-based cancer registries (CRs) depends on the quality of the data collected.
- ❑ Several edits were in place to check the **internal consistency** of European cancer registry data.
- ❑ The ENCR and the JRC launched in 2013 an initiative to establish a standardised list of cancer data quality checks to be adopted by European CRs and in the European projects.
- ❑ The adoption of a common list of variables, formats and standard data quality checks would improve the comparability of the European CR data.

1. Why the JRC-ENCR quality check software (QCS) was developed?

ENCR-JRC Working Group



2. What does the JRC-ENCR QCS check?

It checks the **internal consistency** of the cancer data.

2.1. Case definition

- All primary malignant tumours (behaviour=3), including basal cell and squamous cell carcinomas of skin.
- Benign tumours of the central nervous system (CNS).
- Uncertain behaviour tumours of CNS and urinary bladder.
- In situ tumours: breast, cervix, colon, rectum, urinary bladder and melanoma of the skin.



2. What does the JRC-ENCR QCS check?



A proposal on cancer data quality checks: one common procedure for European cancer registries.
Addendum to version 1.0 (November 2014)
22/12/2016

ICD-O-3

Table 1. Quality checks for the variables and their format (pages 9-14)

The following is the updated version of *Table 1* from the 2014 JRC Technical Report; changes from the previous version are in *italics>*. The 2015 ENCR-JRC call for data protocol has been integrated in *Table 1*, adding the column "Variable name" and a few additional variables.

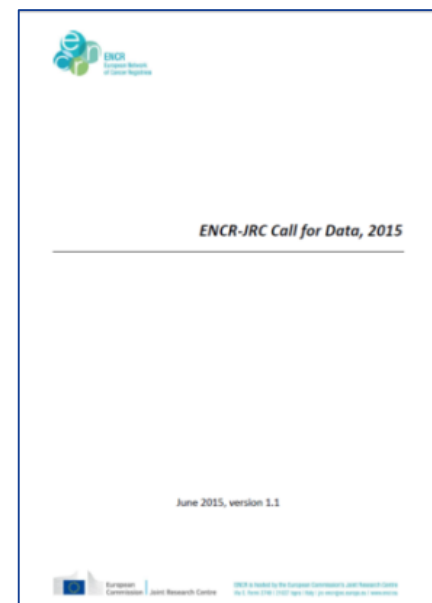
Variable name	Variable description	Format	Maximum length	Core	Missing /unknown values	Allowed values
1_Flag	Check flag	F	1	Y	Not allowed	Allowed values: 0, 1 0 → Not checked 1 → Checked
2_Patient_ID	Patient identification code	A	50	Y	Not allowed	Not allowed to have duplicate combination of the two variables: 2_Patient_ID + 3_Tumour_ID in the same dataset
3_Tumour_ID	Tumour identification code	A	50	Y	Not allowed	

2. What does the JRC-ENCR QCS check?

2.1 The format of the incidence, population, mortality and life table **files** according to the 2015 ENCR-JRC Call for Data protocol → **error message**.

2.2 Intra-record checks:

- **Within variables** (core and optional)
 - variable format → **error message**
 - allow values → **error message**
 - missing value → **error or warning messages**
- **Between variables** → **error or warning messages**



2. What does the JRC-ENCR QCS check?

2.3 Inter-record checks:

- To identify **duplicate** records (= patient and tumour ID)
- Warning for **multiple primary malignant tumours**



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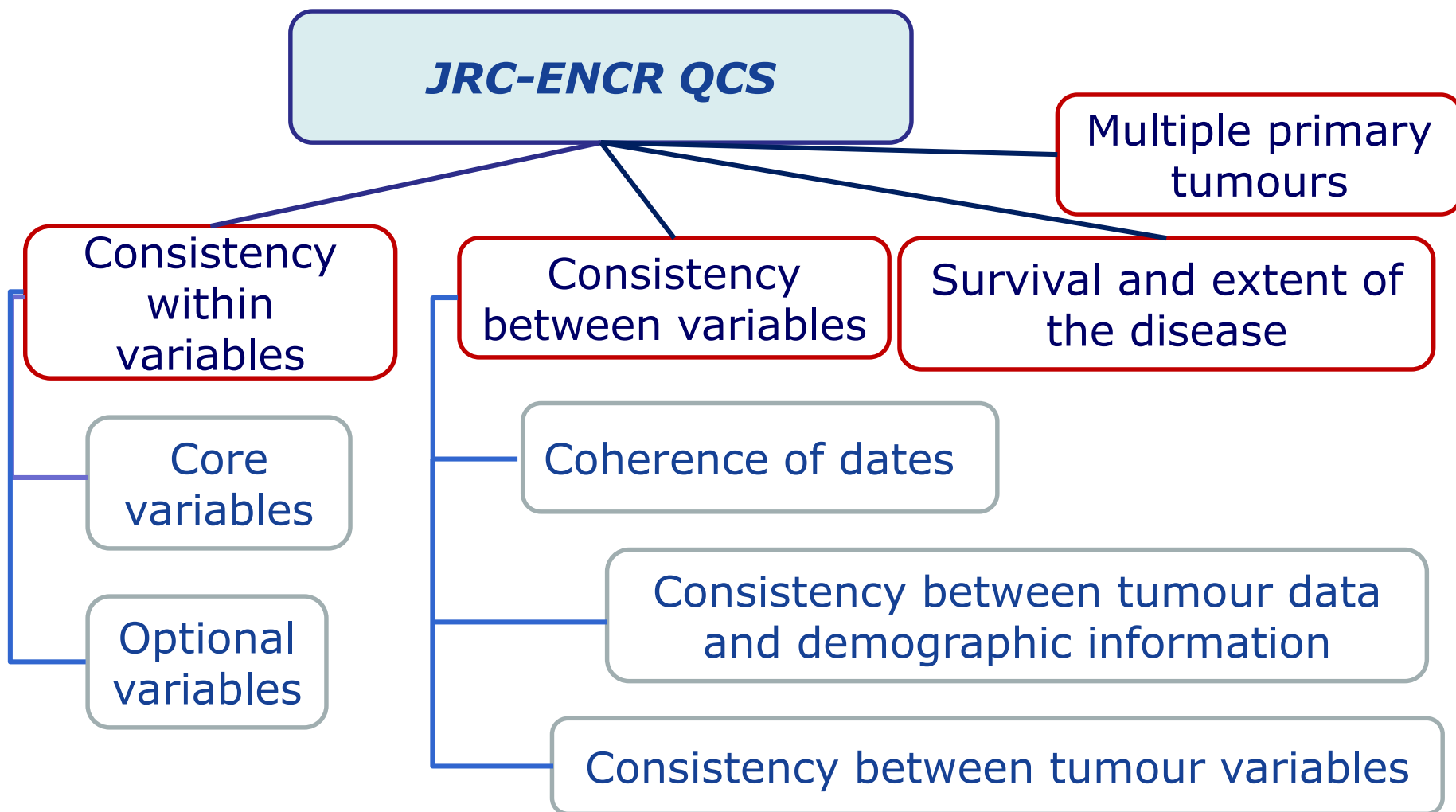
22/12/2016

Multiple primary tumours (MPTs): quality checks included in the JRC-ENCR QCS

A quality checklist for MPTs has been implemented in the JRC-ENCR QCS according to the current International Rules for MPTs published in 2004:

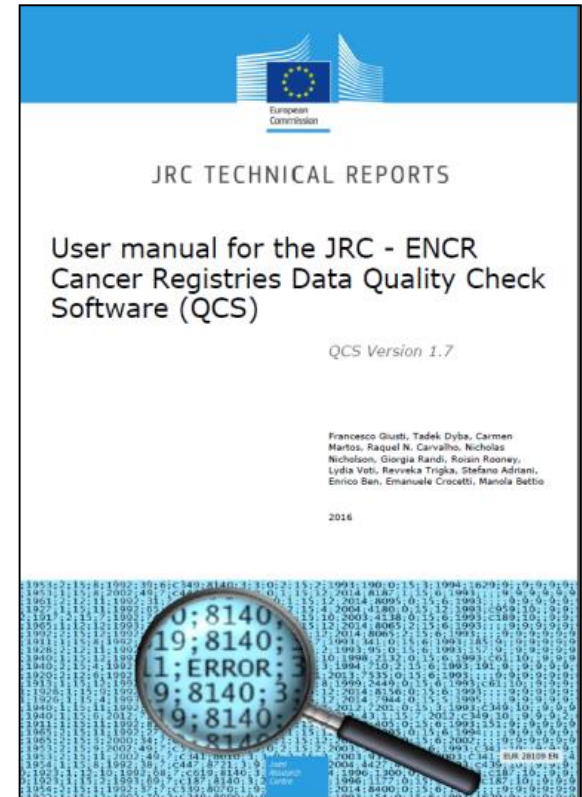
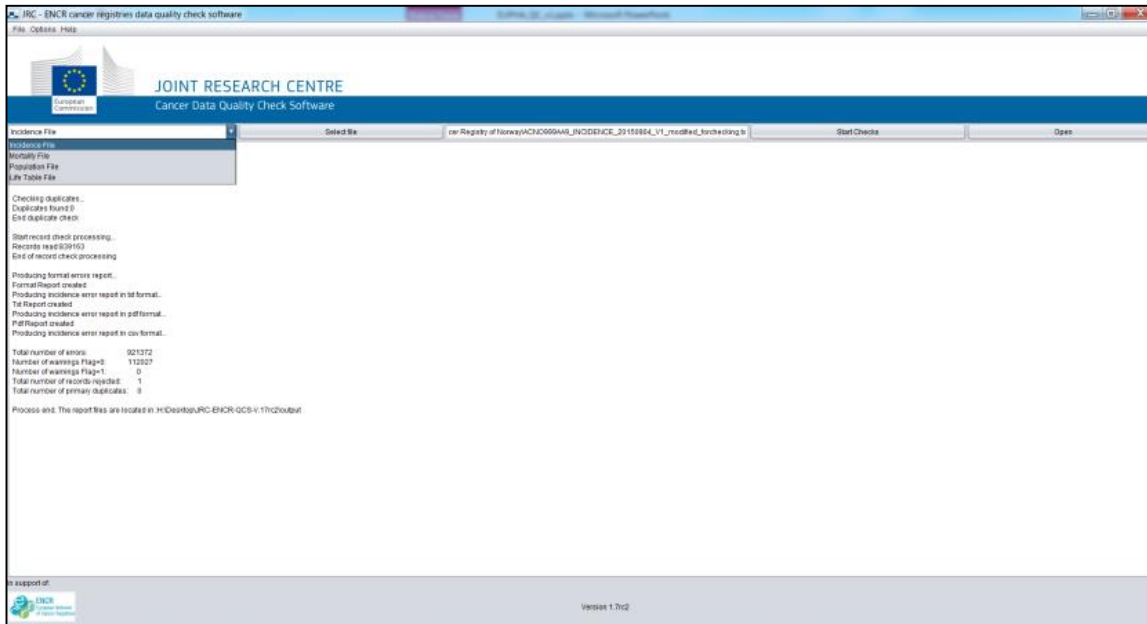
http://www.encr.eu/images/docs/recommendations/MPrules_july2004.pdf).

2. What does the JRC-ENCRC QCS check?



3. How to use it in practice?

4. How to interpret the outputs?



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