Federaal Kenniscentrum voor de Gezondheidszorg
Centre Fédéral d'Expertise des Soins de Santé
Belgian Health Care Knowledge Centre

Clinical recommendations

- It is preferable that first-degree family members of patients with classic adenomatous polyposis and a pathogenic APC (adenomatous polyposis coli) mutation are referred for genetic counselling at the age of 10-12 years. If a clinical picture characteristic of attenuated familial adenomatous polyposis (AFAP) is seen with multiple family members, this may take place at a later age (young adult age).
  If a pathogenic APC mutation is found in the index patient, genetic testing is recommended as it may provide a decisive answer for all family members in relation to risk of the disorder. Children of mutation carriers have a 50% chance of the genetic predisposition to (A)FAP.

- In the case of a person with MAP (biallelic MUTYH mutations), all brothers and sisters of this person should be referred for genetic evaluation given they have a 25% chance of a genetic predisposition. The a priori chance of MAP in a child of a patient with MAP is <1%, given the other parent has a small risk (± 2%) of being a carrier of a MUTYH mutation as well. To determine the risk for potential children of a patient with MAP, it is advised that MUTYH mutation testing is performed on the other parent. If the other parent is shown to be a mutation carrier, the children have a 50% chance of biallelic MUTYH mutations.

- All patients under the age of 60 years with >10 adenomas cumulatively, should be referred for genetic counselling. Exceptionally, referral for genetic analysis should also be considered for young persons with <10 adenomas (high grade dysplasia). In persons ≥60 years of age with more than 10 adenomas cumulatively genetic testing should be considered in case of a positive family history of multiple adenomas.

- Periodic endoscopic examination is recommended in the following patients:
  - Patients with FAP, AFAP, MAP or 'adenomatous polyposis of unknown origin.'
  - Persons with a pathogenic APC mutation
  - Persons with biallelic pathogenic MUTYH mutations
  - Risk carriers: first-degree family members of patients with adenomatous polyposis where the disorder cannot be confirmed by mutation analysis because a pathogenic mutation has not been found in the index patient
  - Risk carriers: first-degree family members of mutation carriers, who have not (yet) been tested themselves.

  Classic FAP: in mutation carriers or risk carriers of classic FAP; yearly surveillance using sigmoidoscopy is recommended from the age of 10-12
  AFAP or MAP: in mutation carriers or risk carriers of AFAP or MAP, surveillance using colonoscopy is recommended once a year or every two years from the age of 18.

- Participation of patients in the FAPA registry[a] is recommended and should be offered to patients concerned.
- APC mutation carriers should be screened for extracolonic manifestations.

a Familial Adenomatous Polyposis Association

Source: KCE Report 220

How to cite this document:
Robays J, Poppe B. Oncogenetic testing for Lynch syndrome and familial adenomatous polyposis – Abstract. Brussels: Belgian Health Care Knowledge Centre (KCE). 2014. KCE Reports 220C.

Publication date: 25-02-2014
Legal depot: D/2014/10.273/26