Technology Offer

NON-INVASIVE METHOD FOR THE DIAGNOSIS OF COLORECTAL CANCER

A research group from CIBER, Clinic Hospital, IDIBAPS and University of Barcelona has identified a new non-invasive biomarkers related to advanced colorectal neoplasia that could improve colorectal cancer screening.

The Need

The vast majority of colorectal cancers (CRC) are adenocarcinomas. Adenomas of the colon, particularly advanced colorectal adenomas (AA), are precursor lesions of the malignant adenocarcinomas.
Current screening test for CRC is called Fecal Immunochemical Test (FIT). FIT offers a low sensitivity for AA (around 20-30%) and a high rate of false positives, that means patients wrongly classified that have to undergo unnecessary colonoscopies.

The Solution

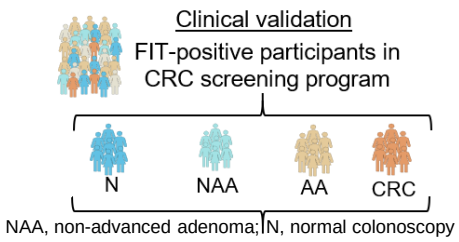
The technology provides a method for diagnosing or screening subjects at risk of suffering from colorectal cancer or advanced colorectal adenomas with more sensitivity and a lower rate of false positives.

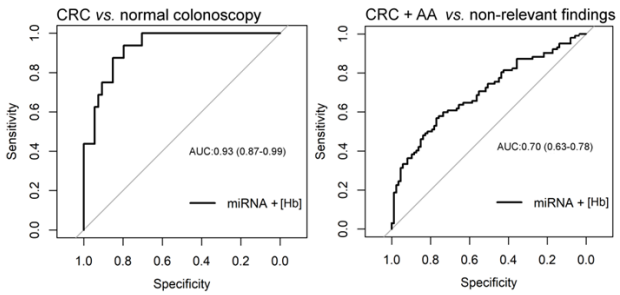
Innovative Aspects

The main innovate aspect of the method is that it is based on the expression level of miRNAs isolated from non-invasive samples (stool samples). The method has higher sensitivity and specificity as compared to fecal hemoglobin concentration of FIT-positive individuals alone too.

The method also determined if patients might be suffering from CRC and/or precancerous stage. Consequently, the method clearly helps in prioritizing individuals and in reducing the number of necessary colonoscopies, being cost-effective for the detection of both colorectal cancer and colorectal adenomas.

Stage of Development:
Validated fecal miRNA-based predictive model in FIT-positive participants.





Intellectual Property:

- Priority European patent application filed (July 15, 2019)
- Suitable for international extension (PCT application)

Duran-Sanchon S. et al. (2019). Identification and validation of microRNA profiles in fecal samples for detection of colorectal cancer. *Gastroenterology.* DOI: https://doi.org/10.1053/j.gastro.2019.10.005

Aims

Looking for a partner interested in a license and/or a collaboration agreement to develop and exploit this asset.

Contact details

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