

Inflammatory Bowel Diseases

Anti-Saccharomyces
Cerevisiae Antibodies

Enzyme Immunoassay
for the determination
of IgA and IgG
antibodies to
Saccharomyces
cerevisiae (ASCA)
in human serum

BlueDot

BlueWell

Dtek



Crohn's disease is one of the two major Inflammatory Bowel Diseases (IBD). IBD an umbrella term covers both primary chronic disorders that cause inflammation or ulceration in the small and large intestine, Crohn's disease and Colitis ulcerosa.

Etiology and Pathology

In contrast to Colitis ulcerosa, Crohn's disease affects both, the small bowel and the colon. Crohn's is a chronic, recurrent disease affecting more women than men, with an incidence of up to 10/100.000, a peak onset between 15 and 25 years of age and a familial aggregation. The etiology is still unrevealed, although a genetic and an infectious background for this disease is in discussion.

Diagnosis

Diagnosis is currently established by Colonoscopy and Ileoscopy. Though Crohn's disease and Colitis ulcerosa share a number of symptoms the course of the diseases, the complications and the management are different, especially when it comes down to surgery. Thus the differential diagnosis of both diseases is crucial prior to treatment. Aggravating, there are 5-10% of the patients that can not be distinguished clearly by the existing available diagnostic methodologies and are consequently referred to as Indeterminate Colitis.

Relevance of antibodies to *S. cerevisiae*

Antibodies to *Saccharomyces cerevisiae* have been reported in 1988 in patients with Crohn's disease by Main et al. already. However the methodologies available in due, Immuno Fluorescence mainly, and their lack of sensitivity and specificity limited the use of this marker to research. It was the identification of the antigen, mannan an outer cell wall component of yeast, that enabled the set-up of tests in standardised Enzyme Immunoassay format. Such a serological test available for Crohn's disease now may become an important tool for clinicians in their difficult task of diagnosing IBD, especially for cases of indeterminate Colitis. Furthermore it may be the only tool available in patient groups that are reluctant to endoscopies, pediatric patients e.g. The high positive predictive value of ASCA determination additionally might offer a possibility too for a convenient and reliable screening and monitoring of risk groups. The value of ASCA for therapy monitoring is subject of future studies.

BlueWELL and BlueDot ASCA kits

D-tek offers clinically validated highly sensitive and specific ELISA's and Immunodot kits for the determination of antibodies to *Saccharomyces cerevisiae* for both subclasses IgA and IgG.

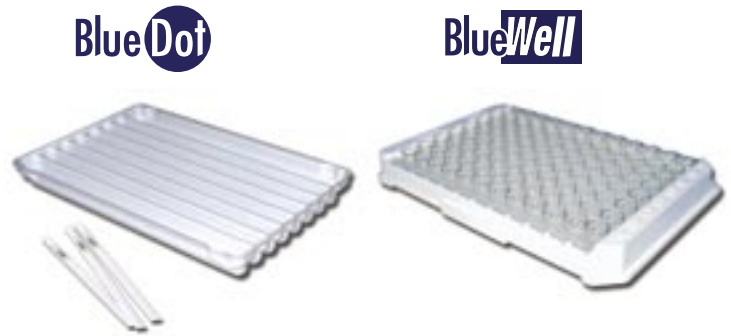
BlueWELL and BlueDOT ASCA Performances

Clinical performance

BlueWELL and BlueDot ASCA IgA-IgG.

SENSITIVITY = 75.0% - SPECIFICITY = 91.7%

Note: Specificity was checked and calculated to a population of Colitis Ulcerosa patients, diagnosed according to Lennard-Jones criteria, as well as a group of non-IBD bowel disease patients and a healthy control population.



Available products and codes

Code	product	interpretation	number of tests
ASCA02-96	ASCA IgA (ELISA)	Quantitative	96 tests
ASCG02-96	ASCA IgG (ELISA)	Quantitative	96 tests
ASCC02-96	ASCA IgA-IgG (ELISA)	Quantitative	96 tests
ASCD-24	BlueDot ASCA IgA-IgG	Qualitative	24 tests

Bibliography

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