

# CARBOHYDRATE-DEFICIENT TRANSFERRIN

## 1. Brief description

The CDT method is used to detect chronic alcoholism. Serum transferrin isoforms are divided into five major fractions with differing levels of sialylation: asialotransferrin (non-sialylated), disialotransferrin, trisialotransferrin, tetrasialotransferrin and penta-sialotransferrin. Poorly sialylated isoforms (in some cases, asialotransferrin-related disialotransferrin) form a transferrin with carbohydrate deficiency (CDT), which is a chronic alcoholism marker.

Detects alcoholism in the early stages.

CDTs rapidly increases after alcohol consumption (faster than GGT).

Normalises 2 - 4 weeks after abstaining from alcohol.

Used together with other markers - GGT, ALAT, ASAT, MCV.

## 2. Method - Capillary electrophoresis.

## 3. Tube labelling, blood storage time, testing material

- Labelling - red or yellow tube (without anticoagulant);
- Blood storage time:
  - At room temperature (+15° - +25° C) - up to 48 hours;
  - In a refrigerator (+2° - +8° C); serum - 10 days, then freeze.
- Testing material - serum.

## 4. Referenced values

CDT < 1.3% - norm

CDT 1.3% - 1.6% - questionable

CDT > 1.6% - elevated

If the CDT score is between 1.3% and 1.6%, then the test should be repeated after a month.

## 5. Deviations from the norm

↑ Alcoholism.

Liver disease - biliary cirrhosis, chronic hepatitis, hepatocarcinoma.

Transferrin genetic changes.