MAYO CLINIC LABORATORIES

# Test Definition: MSCG

Collagenofibrotic Glomerulopathy Confirmation, Mass Spectrometry

## Overview

### Useful For

Aiding in the diagnosis of collagenofibrotic glomerulopathy

### Reflex Tests

| Test Id | Reporting Name | Available Separately | Always Performed |
|---|---|---|---|
| MLCPC | Microdissection, Laser Capture | No, (Bill Only) | No |
| MSPTC | Mass Spectrometry | No, (Bill Only) | No |

### Method Name

Liquid Chromatography Tandem Mass Spectrometry (LC-MS/MS)

### NY State Available

Yes

## Specimen

### Specimen Type

Special

### Necessary Information

**Preliminary pathology report, history, and electron microscopy images are required.**

### Specimen Required

**Supplies:** Pathology Packaging Kit (T554)

**Specimen Type:** Formalin-fixed, paraffin-embedded kidney tissue block

**Collection Instructions: Do not send fixed tissue slides. Testing can only be done on paraffin-embedded tissue blocks.**

### Forms

If not ordering electronically, complete, print, and send 1 of the following forms with the specimen:

-Kidney Transplant Test Request

-Renal Diagnostics Test Request (T830)

### Reject Due To

| | |
|---|---|
| Fixed tissue slides | Reject |

| | |
|---|---|
| Wet/frozen tissue<br>Cytological smears<br>Nonformalin fixed tissue<br>Nonparaffin embedded tissue | |

### Specimen Stability Information

| Specimen Type | Temperature | Time | Special Container |
|---|---|---|---|
| Special | Ambient (preferred) | | |
| | Refrigerated | | |
| | Frozen | | |

## Clinical & Interpretive

### Clinical Information
Collagenofibrotic glomerulopathy (CG), also called collagen type III glomerulopathy, is a rare kidney disease characterized by large amounts of atypical type III collagen fibrils in the mesangium and subendothelial space of renal glomeruli. Liquid chromatography tandem mass spectrometry performed on microdissected glomeruli from patients with CG demonstrates a unique proteomic profile. The presence of type III collagen, in the appropriate clinical and pathological context, can be useful to establish a diagnosis of CG.

### Reference Values
An interpretive report will be provided.

### Interpretation
An interpretation will be provided.

### Cautions
No significant cautionary statements

### Clinical Reference
1. Chen X, Wan H, Xu W, Zhu J. Collagen type III glomerulopathy: Case report and review of the literature. Clin Nephrol. 2017;1:39-46
2. Dong J, Wei H, Han M, Guan Y, Wu Y, Li H. Collagen type III glomerulopathy: A case report and review of 20 cases. Exp Ther Med. 2015;10(4):1445-1449
3. Kurien AA, Larsen CP, Cossey N. Collagenofibrotic glomerulopathy. Clin Kidney J. 2015;8(5):543-547
4. Cohen AH. Collagen type III glomerulopathies. Adv Chronic Kidney Dis. 2012;19(2):101-106
5. Duggal R, Nada R, Rayat CS, Sakhuja V, Joshi K. Collagenofibrotic glomerulopathy - a review. Clin Kidney J.

2012;5(1):7-12

## Performance

### Method Description
Affected areas are removed from paraffin-embedded tissues by laser microdissection. Protein digestion is performed, followed by liquid chromatography tandem mass spectrometry.(Unpublished Mayo method)

### PDF Report
No

### Day(s) Performed
Monday through Friday

### Report Available
7 to 15 days

### Specimen Retention Time
Until reported

### Performing Laboratory Location
Mayo Clinical Laboratories- Rochester Main Campus

## Fees & Codes

### Fees
- Authorized users can sign in to Test Prices for detailed fee information.
- Clients without access to Test Prices can contact Customer Service 24 hours a day, seven days a week.
- Prospective clients should contact their account representative. For assistance, contact Customer Service.

### Test Classification
This test was developed and its performance characteristics determined by Mayo Clinic in a manner consistent with CLIA requirements. It has not been cleared or approved by the US Food and Drug Administration.

### CPT Code Information
82542
88380

### LOINC® Information

| Test ID | Test Order Name | Order LOINC® Value |
|---|---|---|

| | | |
|---|---|---|
| MSCG | CG Confirm, LC MS | 65757-7 |

| Result ID | Test Result Name | Result LOINC® Value |
|---|---|---|
| 615299 | Interpretation | 50595-8 |
| 615300 | Participated in the Interpretation | No LOINC Needed |
| 615301 | Report electronically signed by | 19139-5 |
| 615302 | Material Received | 81178-6 |
| 615303 | Disclaimer | 62364-5 |
| 615304 | Case Number | 80398-1 |
| 617019 | Gross Description | 22634-0 |
| 617020 | Addendum | 35265-8 |