

# TEST UPDATE SERUM PROTEIN ELECTROPHORESIS AND IMMUNOFIXATION

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This change will take effect February 24, 2014

## **OVERVIEW AND CLINICAL UTILITY:**

Effective February 24, 2014, PathGroup will modify the available test codes for serum electrophoresis for ease of ordering for clients. Serum protein electrophoresis is generally performed when monoclonal gammopathy is suspected. Reasons for suspecting a monoclonal gammopathy include, but are not limited to: high total protein with a low A/G ratio; unexplained hypercalcemia, anemia, renal insufficiency, pathologic bone fractures and/ or lesions or peripheral neuropathy.

Guidelines from the international myeloma group for laboratory evaluation of a possible monoclonal protein are as follows:

- 1. 'The serum free light chain (FLC) assay in combination with serum protein electrophoresis and serum immunofixation is sufficient to screen for pathological monoclonal plasma proliferation disorders other than primary amyloidosis (AL) which requires all the serum tests as well as 24 hour urine immunofixation.'
- 2. 'The serum free light chain assay should be measured at diagnosis for all patients with monoclonal gammopathy of undetermined significance (MGUS), smoldering or active multiple myeloma, solitary plasmacytoma and primary amyloidosis.'
- 3. 'Serial free light chain ascertainment should be routinely performed in patients with primary amyloidosis and multiple myeloma patients with oligosecretory disease.'
- 4. 'It should also be done in all patients who have achieved a complete response to determine whether they have attained a stringent complete response.' (1)

(1). Dispenzieri et al; Leukemia 2009; 23(2): 215-224.

## **TEST METHODOLOGY:**

Quantitative Capillary Electrophoresis, Qualitative Immunofixation Electrophoresis

(Please see page two for ordering and collection Information)



## **ORDERING:**

#### PHYSICIAN ORDERS MUST SPECIFY THE REQUEST FOR INTERPRETATION WHEN INCLUSIVE TEST IS ORDERED

Test Name	New Test Code	OLD TEST CODE	СРТ
Myeloma Screening Panel	MYSP	MOGAM/	84165/84155/84165-
		PESRIFLC	26/86334/83883x2
Protein Electrophoresis and IFE	PESIFI	SPE	84165/84155/84165-26/86334
with Interpretation			
Protein Electrophoresis with	PESI	PEMRS	84165/84155/84165-26
Interpretation	1 231	T EIVING	01103/01133/01103 20
Protein Electrophoresis and IFE	PESIF		84165/84155/86334
Immunofixation	XIFE		86334
Protein Electrophoresis (Serum)	PES		84165/84155
Trotem Electrophoresis (Scrum)	1 L3		0+103/0+133

## **REFERENCE RANGE:**

Refer to Directory of Services (DOS) for updated reference ranges.

## **SPECIMEN COLLECTION AND STORAGE:**

# **COLLECTION REQUIREMENTS**

- Collect specimen in a SST.
  - a) Allow serum tube to clot for 30 minutes.
  - b) Spin serum separator tube 10-15 minutes @ 3500 rpm.
- Serum specimens are stable refrigerated for 7 days.
- Transport specimen refrigerated.
- Unacceptable: Hemolysis or Lipemia

**TEST PERFORMED:** Monday - Friday **TURNAROUND TIME:** 1 - 4 Days

For further questions, please contact Client Services at 615-562-9300 or 888-474-5227