

Reporting Title: M-protein Quantitation, Random, U
Performing Location: Mayo Clinic Laboratories - Rochester Superior Drive

Ordering Guidance:
The use of a random urine specimen is sufficient for identifying the presence or absence of monoclonal proteins, but a 24-hour specimen is preferred for quantitating and monitoring the abnormality. See SMPU / Monoclonal Protein Screen, 24 hour, Urine.

Shipping Instructions:
Refrigerate specimen after collection and send refrigerated.

Specimen Requirements:
Supplies: Urine Container, 60 mL (T313)
Submission Container/Tube: Plastic, 60-mL urine bottle
Specimen Volume: 50 mL
Collection Instructions:

- 1. Collect random urine specimen.
- 2. Aliquot between 30 mL and 50 mL of urine into a plastic, 60-mL urine bottle.

Forms:
[If not ordering electronically, complete, print, and send a Renal Diagnostics Test Request](#) (T830) with the specimen.

Specimen Type	Temperature	Time	Special Container
Urine	Refrigerated (preferred)	14 days	
	Ambient	24 hours	
	Frozen	5 days	

Result Codes:

Result ID	Reporting Name	Type	Unit	LOINC®
33044	A/G Ratio	Alphanumeric		44293-9
33045	M spike	Numeric	mg/dL	40661-1
33046	M spike	Numeric	mg/dL	40661-1
33047	Impression	Alphanumeric		49299-1
607975	Albumin	Alphanumeric	mg/dL	6942-7
607976	Alpha-1 globulin	Alphanumeric	mg/dL	9734-5
607977	Alpha-2 globulin	Alphanumeric	mg/dL	38190-5
607978	Beta globulin	Alphanumeric	mg/dL	9744-4
607979	Gamma globulin	Alphanumeric	mg/dL	9745-1
CRTR1	Creatinine, Random, U	Numeric	mg/dL	2161-8
PCRT1	Protein/Creatinine Ratio	Numeric	mg/mg	2890-2
PTCN1	Protein, Total, Random, U	Numeric	mg/dL	2888-6

LOINC® and CPT codes are provided by the performing laboratory.

Supplemental Report:

No

Components:

Test Id	Reporting Name	CPT Units	CPT Code	Always Performed	Available Separately
RPEU	Protein Electrophoresis, Random, U	1	84166	Yes	No
RPTU2	Protein/Creatinine Ratio, Random, U	1	84156	Yes	Yes, (RPTU1)

CPT Code Information:

84156
82570
84166
0077U (if appropriate)

Reflex Tests:

Test Id	Reporting Name	CPT Units	CPT Code	Always Performed	Available Separately
MPTRU	M-protein Mass-Fix, Random, U	1	0077U	No	No

Result Codes for Reflex Tests:

Test ID	Result ID	Reporting Name	Type	Unit	LOINC®
MPTRU	617119	M-protein Isotype MS, Random, U	Alphanumeric		In Process
MPTRU	617120	Flag M-protein Isotype MS, Random, U	Alphanumeric		No LOINC Needed

Reference Values:

CREATININE:
> or =18 years old: 16-326 mg/dL
Reference values have not been established for patients who are younger than 18 years of age.

PROTEIN/CREATININE RATIO:
> or =18 years: <0.18 mg/mg creatinine
Reference values have not been established for patients younger than 18 years of age.

ELECTROPHORESIS, PROTEIN
The following fractions, if present, will be reported as mg/dL:
-Albumin
-Alpha-1-globulin
-Alpha-2-globulin
-Beta-globulin

-Gamma-globulin
No reference values apply to random urines.

MASS-FIX M-PROTEIN ISOTYPE
M-protein Isotype MS:
No monoclonal protein detected

Flag M-protein Isotype MS:
Negative