
Lab Dept:	Serology
Test Name:	PEDIATRIC AUTOIMMUNE CNS EVALUATION, SERUM (< 18 y.o.)

General Information

Lab Order Codes:	PCDES
Synonyms:	Autoimmune Central Nervous System Evaluation, Pediatric
CPT Codes:	83519 x3 – Immunoassay for analyte other than infectious agent antibody or infectious agent antigen, quantitative by radioimmunoassay 86341 – Islet cell antibody 86255 x11 – Fluorescent noninfectious agent, antibody screen, each antibody
Possible reflex testing (at an additional charge):	
84182 x6 – Western blot, with interpretation and report, each 86255 x10 – Fluorescent noninfectious agent, antibody screen, each antibody 86256 x7 – Fluorescent noninfectious agent, titer, each antibody	
Test Includes:	See resources within reference lab test catalog (Mayo Code: PCDES)

Logistics

Test indications:	This test is intended to be ordered for patients younger than 18 years of age. If patient is 18 years of age or older, order Autoimmune Encephalopathy/CNS Disorder Evaluation, Serum (ENS1). Useful for evaluating children with autoimmune central nervous system disorders using serum specimens
Lab Testing Sections:	Serology - Sendouts
Referred to:	Mayo Clinic Laboratories (MML Test: PCDES)
Phone Numbers:	MIN Lab: 612-813-62 STP Lab: 651-220-6550
Test Availability:	Daily, 24 hours
Turnaround Time:	Results in 8-12 days

Special Instructions: Gross hemolysis or lipemia; grossly icteric; mislabeled or unlabeled specimens

Specimen

Specimen Type: Blood

Container: SST (Marble, gold or red)

Draw Volume: 12 mL (Minimum: 6 mL) blood

Processed Volume: 4 mL (Minimum: 2 mL) serum

Collection: Routine blood collection

Special Processing: Lab Staff: Centrifuge specimen, remove serum from cells, aliquot into a screw-capped round bottom vial. Store and ship at refrigerated temperatures.

Specimen stable refrigerated (preferred) or frozen for 28 days, ambient for 72 hours.

Patient Preparation: None

Sample Rejection: Gross hemolysis; grossly icteric; mislabeled or unlabeled specimens

Interpretive

Reference Range:

Test ID	Reporting name	Methodology*	Reference value
PCSI	Peds Autoimmune CNS Interp, S	Medical interpretation	NA
ANN1S	Anti-Neuronal Nuclear Ab, Type 1	IFA	Negative
CS2CS	CASPR2-IgG CBA, S	CBA	Negative
DPPIS	DPPX Ab IFA, S	IFA	Negative
GABCS	GABA-B-R Ab CBA, S	CBA	Negative
GD65S	GAD65 Ab Assay, S	RIA	< or =0.02 nmol/L Reference values apply to all ages.
GFAIS	GFAP IFA, S	IFA	Negative
LG1CS	LGI1-IgG CBA, S	CBA	Negative
GL1IS	mGluR1 Ab IFA, S	IFA	Negative
NCDIS	Neurochondrin IFA, S	IFA	Negative
MOGFS	MOG FACS, S	FACS	Negative
NMDCS	NMDA-R Ab CBA, S	CBA	Negative
NMOFS	NMO/AQP4 FACS, S	FACS	Negative
PCATR	Purkinje Cell Cytoplasmic Ab Type Tr	IFA	Negative

Reflex Information:

Test ID	Reporting name	Methodology	Reference value
AN1BS	ANNA-1 Immunoblot, S	IB	Negative
AN1TS	ANNA-1 Titer, S	IFA	<1:240
AN2BS	ANNA-2 Immunoblot, S	IB	Negative
DPPCS	DPPX Ab CBA, S	CBA	Negative
DPPTS	DPPX Ab IFA Titer, S	IFA	<1:240
GABIS	GABA-B-R Ab IF Titer Assay, S	IFA	<1:240
GFACS	GFAP CBA, S	CBA	Negative
GFATS	GFAP IFA Titer, S	IFA	<1:240
GL1CS	mGluR1 Ab CBA, S	CBA	Negative
GL1TS	mGluR1 Ab IFA Titer, S	IFA	<1:240
MOGTS	MOG FACS Titer, S	FACS	<1:20
NCDCS	Neurochondrin CBA, S	CBA	Negative
NCDTS	Neurochondrin IFA Titer, S	IFA	<1:240

NMDIS	NMDA-R Ab IF Titer Assay, S	IFA	<1:240
NMOTS	NMO/AQP4 FACS Titer, S	FACS	<1:5
PCTTS	PCA-Tr Titer, S	IFA	<1:240
PCTBS	PCA-Tr Immunoblot, S	IB	Negative

*Methodology abbreviations:

Immunofluorescence assay (IFA)

Cell-binding assay (CBA)

Fluorescence activated cell sorting assay (FACS)

Radioimmunoassay (RIA)

Immunoblot (IB)

Limitations:

Negative results do not exclude a diagnosis of autoimmune central nervous disorder.

Intravenous immunoglobulin (IVIg) treatment prior to the serum collection may cause a false-positive result.

Methodology:

See [Reference range](#)

References:

<https://www.mayocliniclabs.com/test-catalog/> February 2023

Updates:

2/20/2023: Updated age guidance, added specimen stability, updated turnaround time, significant changes to reflex tests and reference ranges.