

Neurological Findings Common in Ehlers-Danlos Syndrome, Hypermobility Spectrum Disorder	Check if Present	IIH	CSF Leak/ Tarlov Cyst	Chiari Malformation	CCI/ AAI	Tethered Cord	Arach-noiditis
HA Worse afternoon/evening			X	+/-	X	+/-	+/-
HA Worse early morning		X		+/-			
HA Worse upright/ better supine			X		X	X	X
HA Worse Supine/ better upright		X					
HA Worse with Valsalva		X	X	X			
HA Better with Caffeine			X				
HA Better with Compression			X				
HA Better with C-collar					X		
HA Top of Head		X	+/-	+/-			
HA Occipital			X	X	X	X	X
HA "Pressure"		X		X			
"Bobblehead"			X		X		
Interscapular Radiation			X	X		X	X
Vision/ Hearing Changes		X	X	X	X	+/-	+/-
"Brain Fog"		X	X	X	X	X	X
Autonomic dysfunction/POTS		X	X	X	X		
Sensory Changes		X	X	X	X	X	X
Weakness/Loss of Coordination		X	X	X	X	X	X
Tics/ Tremors/ Jerks		X	X	X	X	X	X
Orthostatic Intolerance			X	X	X		
Balance Disturbance/Dizziness		X	X	X	X	X	
Dysphagia/ Speech Problems			X	X	X		
Mood Changes		X	X	X	X		+/-
Hormonal Changes		X	X				+/-
Nausea/Vomiting		X	X	X	X		
Bowel/ Bladder Dysfunction		X	X	X	X	X	X
"Drop Attacks"				X	X		
Changes in/Loss of Consciousness		X	X	X	X		
Seizure Activity		X	X	X	X		
Sleep Apnea/Breathing Disturbance		X	X	X	X		
Depersonalization/ Derealization		X	X	X	X		
Memory Loss		X	X	X	X	+/-	+/-

For further information, contact Brianna Cardenas, DMSc, PA-C, ATC:

<https://www.healedandempowered.com>

Brianna provides online consulting regarding these conditions.

MRI Recommendations to test for some of the above conditions:

- Cervical X-rays for initial instability eval: "X-rays of the C-spine AP/Lateral/odontoid + flexion/extension (please allow patient to go to end range of motion). Measure clivoaxial angle in each position."
- Brain MRI for high/low pressure, chiari, CCI, etc: "Brain MRI without contrast. Please include T2 sagittal and open image to capture C2. Please measure Clivoaxial Angle, Grabb-Oakes Measurement, Basion-Dens Interval, mammillopontine distance, prepontine cistern, supracellar cistern, interpeduncular angle, and pontomesocephalic angle. Please calculate BERN score."
- Cervical MRI for CCI eval: "Cervical MRI without contrast. Please capture above craniocervical junction (include clivus). Add flexion and extension views - please allow patient to go to end range of motion. Please measure Clivoaxial Angle, Grabb-Oakes Measurement, Harris Measurement, and Basion-Dens Interval. Please include coronal T2 view."
- Lumbar MRI for tethered cord: "Lumbar MRI without contrast with additional sagittal image in prone position. Please open image to capture mid T11-mid Sacrum. Please include T2 coronal view. Prone and supine imaging with measurement of conus movement in central canal"