

**RIH – PEDI CERVICAL SPINE
SIEMENS DEFINITION AS20 PROTOCOL**

Indication: fracture, trauma, mets, disc rupture, disc herniation, stenosis, post myelogram.

Position/Landmark	Head first or feet first-Supine Mid Skull				
Topogram Direction	Craniocaudal / Craniocaudal				
Respiratory Phase	Suspension				
Scan Type	Helical				
Ref kV/Ref mAs/Rotation time (sec) Pitch / Speed (mm/rotation) Safire Strength / Dose Optimization	Care kV 100 / Care Dose4D 230 / 1.0 sec .8:1 , 10.00mm 2 / 3				
Detector width x Rows = Beam Collimation	0.625mm x 20 = 12.5mm				
Average Tube Output	ctdi – 5.0mGy dlp – 110mGy.cm				
Helical Set		body	thickness/		recon
Slice Thickness/ Spacing	recon	part	spacing	algorithm	destination .
Algorithm	1	axial c spine tissue	3mm x 3mm	I40f medium	pac
Recon Destination	2	axial c spine bone	3mm x 3mm	I70h very sharp	pac
	3	coronal c spine	3mm x 3mm	I70h very sharp	pac
	4	sagittal c spine	3mm x 3mm	I70h very sharp	pac
	5	thin c spine	.75mm x .7mm	I70h very sharp	terarecon
Scan Start / End Locations	external auditory meatus mid body of T1				
DFOV	18cm decrease appropriately				
IV Contrast Volume / Type / Rate	Contrast volume is 1cc per pound of body weight omni 300 / 2cc per second or hand injection if necessary				
Scan Delay	65 seconds or just after hand injection is done				
2D/3D Technique Used	Workstream 4D mpr of 3mm x 3mm coronal and sagittal c spine series, auto-transferred to PACS.				
Comments: Recon 5 is a thin helical volume of the c spine that is archived to the TeraRecon server.					
Images required in PACS	Topograms, 3mm x 3mm axial c spine soft tissue, 3mm x 3mm axial c spine bone, 3mm x 3mm coronal c spine, 3mm x 3mm sagittal c spine, Patient Protocol				