

## RIH – PROSPECTIVE GATED AORTA GE LIGHTSPEED VCT PROTOCOL

**Indications: ascending aorta aneurysm/dissection or aortic valve disease**

<b>Position/Landmark</b>	Feet first-Supine Sternal Notch				
<b>Topogram Direction</b>	Craniocaudal				
<b>Respiratory Phase</b>	Inspiration				
<b>Scan Type</b>	Cine				
<b>KV / mA / Rotation time (sec)</b> <b>Pitch / Speed (mm/rotation)</b> <b>Noise Index / ASiR / Dose Reduction</b>	120kv / 600 mA / 0.35 sec 40.00mm - / 30 / 20%				
<b>Detector width x Rows = Beam Collimation</b>	0.625mm x 64 = 40mm				
<b>Average Tube Output</b>	ctdi – 14.5mGy dlp – 301 mGy.cm				
<b>Cine Set</b> Slice Thickness/ Spacing Algorithm Recon Destination	recon	body part	thickness/ spacing	algorithm	recon destination . pacs
	1	<b>small fov gated aorta</b>	0.6mm x 0.6mm	standard	
<b>Scan Start / End Locations</b>	just superior to aortic arch 2cm inferior to heart				
<b>DFOV</b>	25cm				
<b>IV Contrast Volume / Type / Rate</b>	60mL Iohexol (Omnipaque 350) / 5.5mL per second 50mL Iohexol (Omnipaque 350) / 4mL per second 40mL saline / 4mL per second				
<b>Scan Delay</b>	Smart Prep at <b>ascending thoracic aorta</b> at level of carina				
<b>2D/3D Technique Used</b>	2.5mm x 2.5mm, mip mode, <b>full chest fov coronal and sagittal reformats</b> 2.5mm x 2.5mm, average mode, <b>full chest fov axial reformats</b>				
<p><b>Comments: This protocol scans a small fov prospective gated aorta. Then full chest retro-recons and reformats are created afterwards.</b></p> <p><b>The dynamic padding time should stay at 10ms for this protocol.</b> Adjusting the padding with the patient's heart rate is not needed.</p> <ul style="list-style-type: none"> <li>The cardiac monitor leads should be below the clavicles and just below the curvature of the left ribs.</li> </ul> <p><b>Please create a 2.5mm, full chest field of view, lung algorithm in retro-recon and send it to pacs.</b></p>					
<b>Images required in PACS</b>	Scouts, .6mm x .6mm small fov axial gated aorta cta, 2.5mm x 2.5mm full chest axial gated chest cta, 2.5mm x 2.5mm coronal aorta mip, 2.5mm x 2.5mm sagittal aorta mip, 2.5mm x 2.5mm axial full chest fov lung window Dose Report				