Gundersen Health System

# Angio Head

Siemens Flash

| Application Examples: cerebral vascular abnormalities |
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|---|---|
| Oral Contrast | No |
| IV Contrast / Volume | 75 ml Omnipaque 350 |
| Injection Rate | 5 mL/sec |

*Technical Factors*

| | |
|---|---|
| Care Bolus ROI Location / HU | *see scan instructions |
| Monitoring Delay | 10 seconds |
| Cycle Time | 1.5 seconds |
| Scan Delay | 2 seconds |
| Breath Hold | N/A |

| | |
|---|---|
| Detector Collimator | Acq 128 x 0.6 mm |
| Care kV | Semi / 120 kV |
| Care Dose 4D | On / 165 mAs |
| Rotation Time (seconds) | 0.5 |
| Pitch | 1.2 |
| Typical CTDIvol | 25.24 mGy ± 50% |

Topogram: Lateral, 256 mm

| AngioHead | Recon Type | Width / Increment | Algorithm | Safire | Window | FoV | Series Description | Networking | Post Processing |
|---|---|---|---|---|---|---|---|---|---|
| **Recon 1** | Axial | 0.6 x 0.6 | J30f | 2 | Angio | 160 | AXIAL | PACS & TR | Rotating MIP & VR |
| **Recon 2** | 3D:COR | 10 x 4 | J30f | 2 | Angio | - | COR MIP | PACS | Coronal MIP |
| **Recon 3** | 3D:SAG | 10 x 4 | J30f | 2 | Angio | - | SAG MIP | PACS | Sagittal MIP |
| **Recon 4** | 3D: AXIAL | 10 x 4 | J30f | 2 | Angio | - | AXIAL MIP | PACS | Axial MIP |

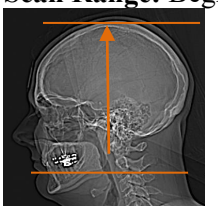
**First preference is to scan using Dual Energy (DE).**

**IV Placement:** ≥ 18 gauge, *preferably* in antecubital (AC) fossa.

**Patient Preparation:** Have patient remove any detachable dental work.

**Patient Position:** Patient lying supine with arms at sides. Tuck chin slightly and position head so the sella is parallel to the gantry in a symmetrical position (no rotation or tilt).

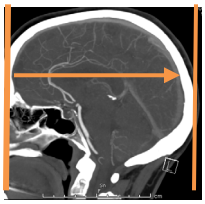
**Scan Range:** Begin at C2 and scan through skull vertex.



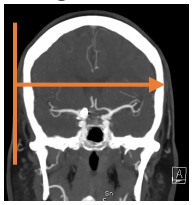
**Scan Instructions:** *Take pre-monitoring around level of carotid bifurcations and place ROI in air. Manually trigger scan as soon as first blush of contrast is in carotid arteries.

**Recons and Reformations:** Center on circle of willis (COW). Make coronal, sagittal and axial MIPs as depicted below.

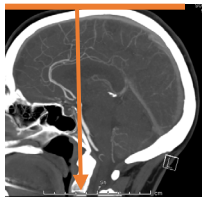
**Coronal MIP**



**Sagittal MIP**



**Axial MIP**



**3D:** Rotating MIP of bone subtracted data set. VR of COW. See post processing protocol for further details.