

# CTA Chest for PE+AP 64 GE

Indications	SOB, Chest pain, cough, elevated d-dimer, hemoptysis, Nausea, Vomiting				
Diagnostic Task	Detect pulmonary embolism, nodules or masses and characterize their size and shape, abnormal fluid collections in chest				
Scan mode	Helical				
Position/Landmark	Head first-Supine Sternal Notch S60-I350				
Topogram	AP 120kV 20mA Lat 120kV 40mA				
kVp/Reference mass	120kv Auto mA (200-440)				
Rotation time/pitch	0.5/0.984:1				
Detector Configuration	64x0.625				
Table Speed/Increment	39.37				
Dose reduction	Noise Index 15.86				
Allowed CTDI ranges*	7mGy-50mGy				
XR29 Dose Notification value	50mGy				
Helical Set #1       When super D or stereo chest	recon	body part	thickness spacing	algorithm	recon destination
	1	chest	1.25mmx 1.25mm	standard	paces
	2	lung	1.25mmx 1.25mm	lung	paces
	3	sag chest	2mmx2mm	standard	paces
	4	coronal chest	2mmx2mm	standard	paces
	5	axial mip lung	10mmx2mm	standard	paces
	6	thin chest	1.25mmx1.0mm	standard	paces
	7	MIP Pulmonary art RT	10mmx2mm	standard	paces
	8	MIP Pulmonary art LT	10mmx2mm	standard	paces
Helical Set #2 70 second delay	recon	body part	thickness spacing	algorithm	recon destination
	1	abdomen/pelvis	2.5mmx 2.5mm	standard	paces
	2	sag abdomen	2mmx2mm	standard	paces
	3	coronal abdomen	2mmx2mm	standard	paces
Scan Start	Chest-2cm superior to lung apices// AP Diaphragm				
end location	Chest-inferior aspect of L-1//AP lesser trochanter				
DFOV	40cm/decrease for lung recons				
IV contrast volume/type	<b>&lt;200lbs 100ml isovue 370 @4cc/sec      &gt;200lbs 125ml isouve 370 @5cc/sec</b>				
	Performed as directed by the supervising radiologist				
	bolus tracking at pulmonary trunk(level just inferior to carina)//AP 70sec				
Scan delay	Initiate scan manually-enhancement threshold of 80HU				
	Comments: Being able to locate the pulmonary trunk is important. The monitoring phase will not trigger properly and the scan will not start correctly if the roi is not placed on the correct anatomy.				
	<b>Approximate Values for CTDIvol</b>				
	Patient size	weight(kg)	weight(lbs)	CTDIvol(mGy)	
	SMALL	50-70	110-155	4-10	
	AVERAGE	70-90	155-200	8-16	
	LARGE	90-120	200-265	14-22	
NOTE*	*The AAPM recommended NEMA XR29 Dose Notification Value for an adult torso is 50mGy. Dose Notification levels less than the AAPM recommended can be set. The maximum CTDI vol should match the dose notification value. Exams with CTDI vol values less than the minimum				

allowed range should not be performed unless approved by a radiologist.

