

PROTOCOL: LONG BONE WO *METAL* *ALL SERIES MUST COMPLETELY INCLUDE PROSTHESIS*****

COIL: HIGH CHANNEL COUNT (12+) BODY ARRAY OR (8+) FLEX COIL WRAPPED AROUND; COIL-IN-TABLE SYSTEMS SHOULD USE POSTERIOR ARRAY COIL ELEMENTS ALSO

POSITIONING: Position lower extremity in mild INTERNAL ROTATION. Position upper extremity SUPINATED.

CLINICAL INDICATIONS/ HISTORY: EXTENSIVE METAL HARDWARE PRESENT, PAIN, INJURY, FRACTURE, LOOSENING, INFECTION (IF NON CONTRAST), MASS (IF NON CONTRAST)

PLOTTING: Plot sagittal/coronal approximately same as routine ankle Axial = true axial to tibia

COVERAGE: Entire affected area

TIPS: If using body array coil vertically on Siemens, assure that all coil elements are turned on. Do NOT use fat sat around metal - the fat sat will not work

SCAN ORDER	PLANE	IMAGE CONTRAST/WEIGHTING	MODE/SEQ TYPE	Averages (NEX)	BW (Hz/pixel)	ETL	TR RANGE	TE RANGE	TI	FLIP ANGLE	SLICE/GAP (mm)	FOV (cm)	Resolution	Phase Axis	Send to PACS	Fat sat
1A (Siemens)	AX	STIR SEMAC	2D	1	400-600 Hz/px	20-40	3000 - 6000	35-45	140 - 150	>110	6/0	16-22	256 x 256	SI	FULL SERIES	
1B (GE)	AX	STIR MAVRIC	3D	0.5	+/- 125kHz	22-26	3500 - 6000	35-45	140 - 150	>110	6/0	16-22	256 x 256	SI	FULL SERIES	
2	AX	T1 WARP/MARS	2D/FSE	3-5	300-500 Hz/px	2-12	450-650	6-18		>110	6/0	16-22	256 x 256	SI	FULL SERIES	NONE
3	COR	STIR WARP/MARS	2D/FSE	3-5	300-500 Hz/px	16-24	3500 - 6000	24-40	140 - 150	>110	4/0	40-50	256 x 256	SI	FULL SERIES	NONE
4A (Siemens)	SAG	STIR SEMAC	2D	1	400-600 Hz/px	20-40	3000 - 6000	35-45	140 - 150	>110	4/0	40-50	256 x 256	SI	FULL SERIES	
4B (GE)	SAG	STIR MAVRIC	3D	0.5	+/- 125kHz	22-26	3500 - 6000	35-45	140 - 150	>110	4/0	40-50	256 x 256	SI	FULL SERIES	
5A (Siemens)	COR	T1 SEMAC	2D	1-2	400-600 Hz/px	10-40	450-750	6-18		>110	4/0	40-50	256 x 256	SI	FULL SERIES	NONE
5B (GE)	COR	T1 MAVRIC	3D	0.5	+/- 125kHz	4-20	450-750	6-18		>110	4/0	40-50	256 x 256	SI	FULL SERIES	NONE
IF MASS ADD THIS SEQUENCE																
6	AX	T2 WARP/MARS	2D/FSE	3-5	300-500 Hz/px	16-24	3500 - 6000	65-75		>110	6/0	16-22	256 x 256	SI	FULL SERIES	NONE