

SIEMENS MAGNETOM Investigational_Device_7T syngo MR B17

\\USER\UserProtocols\Renzo\anatomy_slab_highres\highres_gre_768x576_2echo_a30_0.3x0.3x0.7

TA: 5:59 PAT: 2 Voxel size: 0.4x0.4x0.7 mm Rel. SNR: 1.00 SIEMENS: gre

Properties

Prio Recon	Off
Before measurement	
After measurement	
Load to viewer	On
Inline movie	Off
Auto store images	On
Load to stamp segments	Off
Load images to graphic segments	Off
Auto open inline display	Off
Start measurement without further preparation	On
Wait for user to start	Off
Start measurements	single

Routine

Slab group 1	
Slabs	1
Dist. factor	20 %
Position	R3.3 A13.5 H34.9
Orientation	T > C-4.3 > S0.7
Phase enc. dir.	R >> L
Rotation	90.00 deg
Phase oversampling	0 %
Slice oversampling	0.0 %
Slices per slab	60
FoV read	140 mm
FoV phase	100.0 %
Slice thickness	0.70 mm
TR	35 ms
TE 1	8.50 ms
TE 2	23.20 ms
Averages	1
Concatenations	1
Filter	None
Coil elements	A32

Contrast

MTC	Off
Magn. preparation	None
Flip angle	10 deg
Fat suppr.	None
Water suppr.	None
SWI	Off
Averaging mode	Short term
Reconstruction	Magn./Phase
Measurements	1
Multiple series	Each measurement

Resolution

Base resolution	320
Phase resolution	100 %
Slice resolution	100 %
Phase partial Fourier	Off
Slice partial Fourier	Off
Interpolation	Off
PAT mode	GRAPPA
Accel. factor PE	2
Ref. lines PE	24
Accel. factor 3D	1
Reference scan mode	Integrated
Image Filter	Off

Distortion Corr.	Off
Prescan Normalize	Off
Normalize	Off
B1 filter	Off
Raw filter	Off
Elliptical filter	Off

Geometry

Multi-slice mode	Interleaved
Series	Interleaved
Saturation mode	Standard
Special sat.	None
Table position	H
Table position	0 mm
Inline Composing	Off
Tim CT mode	Off

System

V32	Off
A32	On
Positioning mode	FIX
MSMA	S - C - T
Sagittal	R >> L
Coronal	A >> P
Transversal	F >> H
Save uncombined	Off
Coil Combine Mode	Adaptive Combine
AutoAlign	---
Auto Coil Select	Default
Shim mode	Standard
Adjust with body coil	Off
Confirm freq. adjustment	Off
Assume Silicone	Off
? Ref. amplitude 1H	0.000 V
Adjustment Tolerance	Auto
Adjust volume	
! Position	R4.4 A16.4 H30.4
! Orientation	S > T0.5
! Rotation	-0.26 deg
! F >> H	69 mm
! A >> P	131 mm
! R >> L	151 mm

Physio

1st Signal/Mode	None
Segments	1
Tagging	None
Dark blood	Off
Resp. control	Off

Inline

Subtract	Off
Liver registration	Off
Std-Dev-Sag	Off
Std-Dev-Cor	Off
Std-Dev-Tra	Off
Std-Dev-Time	Off
MIP-Sag	Off
MIP-Cor	Off
MIP-Tra	Off
MIP-Time	Off

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Save original images	On
Wash - In	Off
Wash - Out	Off
TTP	Off
PEI	Off
MIP - time	Off

MapIt	None
Contrasts	2

Sequence

Introduction	Off
Dimension	3D
Elliptical scanning	Off
Phase stabilisation	Off
Asymmetric echo	Off
Bandwidth 1	80 Hz/Px
Bandwidth 2	60 Hz/Px
Flow comp. 1	No
Flow comp. 2	No
Readout mode	Bipolar
RF pulse type	Normal
Gradient mode	Fast
Excitation	Slab-sel.
RF spoiling	On

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\\USER\UserProtocols\Renzo\anatomy_slab_highres\MP2RAGE_slab_0.37iso_T1

TA: 4:32 PAT: 2 Voxel size: 0.4x0.4x0.7 mm Rel. SNR: 1.00 USER: tfl_wip900b17a

Properties

Prio Recon	Off
Before measurement	
After measurement	
Load to viewer	On
Inline movie	Off
Auto store images	On
Load to stamp segments	Off
Load images to graphic segments	Off
Auto open inline display	Off
Start measurement without further preparation	On
Wait for user to start	Off
Start measurements	single

Routine

Slab group 1	
Slabs	1
Dist. factor	50 %
Position	R3.3 A13.5 H34.9
Orientation	T > C-4.3 > S0.7
Phase enc. dir.	R >> L
Rotation	90.00 deg
Phase oversampling	0 %
Slice oversampling	0.0 %
Slices per slab	60
FoV read	140 mm
FoV phase	100.0 %
Slice thickness	0.70 mm
TR	6000 ms
TE	4.23 ms
Averages	1
Concatenations	1
Filter	None
Coil elements	A32

Contrast

Magn. preparation	Non-sel. IR
TI 1	900 ms
TI 2	2900 ms
Flip angle 1	6 deg
Flip angle 2	7 deg
Fat suppr.	None
Water suppr.	None
2nd Inversion Contrast	On
Averaging mode	Long term
Reconstruction	Magn./Phase
Measurements	1
Multiple series	Each measurement

Resolution

Base resolution	320
Phase resolution	100 %
Slice resolution	100 %
Phase partial Fourier	Off
Slice partial Fourier	6/8
PAT mode	GRAPPA
Accel. factor PE	2
Ref. lines PE	24
Accel. factor 3D	1
Reference scan mode	Integrated
Image Filter	Off

Distortion Corr.	Off
Prescan Normalize	Off
Raw filter	Off
Elliptical filter	Off

Geometry

Multi-slice mode	Single shot
Series	Interleaved
Table position	H
Table position	0 mm
Inline Composing	Off

System

V32	Off
A32	On
Positioning mode	FIX
MSMA	S - C - T
Sagittal	R >> L
Coronal	A >> P
Transversal	F >> H
Save uncombined	Off
Coil Combine Mode	Adaptive Combine
AutoAlign	---
Auto Coil Select	Default
Shim mode	Standard
Adjust with body coil	Off
Confirm freq. adjustment	Off
Assume Silicone	Off
! Ref. amplitude 1H	277.000 V
Adjustment Tolerance	Auto
Adjust volume	
! Position	R4.4 A16.4 H30.4
! Orientation	S > T0.5
! Rotation	-0.26 deg
! F >> H	69 mm
! A >> P	131 mm
! R >> L	151 mm

Physio

1st Signal/Mode	None
Dark blood	Off
Resp. control	Off

Composing

Sequence

Introduction	On
Dimension	3D
Elliptical scanning	Off
Asymmetric echo	Off
Contrasts	1
Bandwidth	190 Hz/Px
Flow comp.	No
Echo spacing	8.6 ms
RF pulse type	Fast
Gradient mode	Fast
Excitation	Slab-sel.
RF spoiling	On
FFT Scale Factor	150 %
Morphometry Analysis	Off
FID MoCo Logging	Off
FID Coil Phase Corr.	Off

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LIN/PAR Swap	On
Ext. INV Pulse	On
Flip Angle	1400
Phase Filter	0 px
Uniform Image	On
Head Mask on UNI	Off
T1 Map	On
Complex Div. Image	On
Denoise Weighting	150
FLAWS	Off

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\\USER\UserProtocols\Renzo\anatomy_slab_highres\MP2RAGE_slab_0.50iso_aligned

TA: 16:08 PAT: Off Voxel size: 0.5x0.5x0.5 mm Rel. SNR: 1.00 USER: tfl_wip900b17a

Properties

Prio Recon	Off
Before measurement	
After measurement	
Load to viewer	On
Inline movie	Off
Auto store images	On
Load to stamp segments	Off
Load images to graphic segments	Off
Auto open inline display	Off
Start measurement without further preparation	On
Wait for user to start	Off
Start measurements	single

Routine

Slab group 1	
Slabs	1
Dist. factor	50 %
Position	R28.0 A12.1 H40.9
Orientation	T > S38.1
Phase enc. dir.	R >> L
Rotation	70.00 deg
Phase oversampling	0 %
Slice oversampling	0.0 %
Slices per slab	30
FoV read	144 mm
FoV phase	100.0 %
Slice thickness	0.50 mm
TR	6000 ms
TE	3.53 ms
Averages	1
Concatenations	1
Filter	None
Coil elements	A32

Contrast

Magn. preparation	Non-sel. IR
TI 1	800 ms
TI 2	2700 ms
Flip angle 1	5 deg
Flip angle 2	6 deg
Fat suppr.	None
Water suppr.	None
2nd Inversion Contrast	On

Averaging mode	Long term
Reconstruction	Magn./Phase
Measurements	7
Pause after meas. 1	0.0 s
Pause after meas. 2	0.0 s
Pause after meas. 3	0.0 s
Pause after meas. 4	0.0 s
Pause after meas. 5	0.0 s
Pause after meas. 6	0.0 s
Multiple series	Each measurement

Resolution

Base resolution	290
Phase resolution	100 %
Slice resolution	100 %
Phase partial Fourier	7/8
Slice partial Fourier	6/8
PAT mode	None

Image Filter	Off
Distortion Corr.	Off
Prescan Normalize	Off
Raw filter	Off
Elliptical filter	Off

Geometry

Multi-slice mode	Single shot
Series	Interleaved

Table position	H
Table position	0 mm
Inline Composing	Off

System

V32	Off
A32	On
Positioning mode	FIX
MSMA	S - C - T
Sagittal	R >> L
Coronal	A >> P
Transversal	F >> H
Save uncombined	Off
Coil Combine Mode	Adaptive Combine
AutoAlign	---
Auto Coil Select	Default
Shim mode	Standard
Adjust with body coil	Off
Confirm freq. adjustment	Off
Assume Silicone	Off
! Ref. amplitude 1H	277.000 V
Adjustment Tolerance	Auto
Adjust volume	
! Position	R22.8 A16.1 H36.2
! Orientation	S > T0.5
! Rotation	-0.26 deg
! F >> H	60 mm
! A >> P	72 mm
! R >> L	90 mm

Physio

1st Signal/Mode	None
Dark blood	Off
Resp. control	Off

Composing

Sequence

Introduction	On
Dimension	3D
Elliptical scanning	Off
Asymmetric echo	Off
Contrasts	1
Bandwidth	260 Hz/Px
Flow comp.	No
Echo spacing	7.2 ms

RF pulse type	Fast
Gradient mode	Fast*
Excitation	Slab-sel.
RF spoiling	On

FFT Scale Factor	150 %
Morphometry Analysis	On

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FID MoCo Logging	Off
FID Coil Phase Corr.	Off
LIN/PAR Swap	On
Ext. INV Pulse	On
Flip Angle	1400
Phase Filter	0 px
Uniform Image	On
Head Mask on UNI	Off
T1 Map	On
Complex Div. Image	On
Denoise Weighting	150
FLAWS	Off

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\\USER\UserProtocols\Renzo\anatomy_slab_highres\MP2RAGE_slab_0.4x0.4x1.2_T1

TA: 2:26 PAT: 2 Voxel size: 0.4x0.4x1.2 mm Rel. SNR: 1.00 USER: tfl_wip900b17a

Properties

Prio Recon	Off
Before measurement	
After measurement	
Load to viewer	On
Inline movie	Off
Auto store images	On
Load to stamp segments	Off
Load images to graphic segments	Off
Auto open inline display	Off
Start measurement without further preparation	On
Wait for user to start	Off
Start measurements	single

Routine

Slab group 1	
Slabs	1
Dist. factor	50 %
Position	R30.1 P0.3 H28.1
Orientation	T > S30.8 > C-11.5
Phase enc. dir.	R >> L
Rotation	60.00 deg
Phase oversampling	0 %
Slice oversampling	0.0 %
Slices per slab	32
FoV read	140 mm
FoV phase	100.0 %
Slice thickness	1.20 mm
TR	6000 ms
TE	4.23 ms
Averages	1
Concatenations	1
Filter	None
Coil elements	A32

Contrast

Magn. preparation	Non-sel. IR
TI 1	900 ms
TI 2	2900 ms
Flip angle 1	6 deg
Flip angle 2	7 deg
Fat suppr.	None
Water suppr.	None
2nd Inversion Contrast	On
Averaging mode	Long term
Reconstruction	Magn./Phase
Measurements	1
Multiple series	Each measurement

Resolution

Base resolution	320
Phase resolution	100 %
Slice resolution	100 %
Phase partial Fourier	Off
Slice partial Fourier	6/8
PAT mode	GRAPPA
Accel. factor PE	2
Ref. lines PE	24
Accel. factor 3D	1
Reference scan mode	Integrated
Image Filter	Off

Distortion Corr.	Off
Prescan Normalize	Off
Raw filter	Off
Elliptical filter	Off

Geometry

Multi-slice mode	Single shot
Series	Interleaved
Table position	H
Table position	0 mm
Inline Composing	Off

System

V32	Off
A32	On
Positioning mode	FIX
MSMA	S - C - T
Sagittal	R >> L
Coronal	A >> P
Transversal	F >> H
Save uncombined	Off
Coil Combine Mode	Adaptive Combine
AutoAlign	---
Auto Coil Select	Default
Shim mode	Standard
Adjust with body coil	Off
Confirm freq. adjustment	Off
Assume Silicone	Off
! Ref. amplitude 1H	277.000 V
Adjustment Tolerance	Auto
Adjust volume	
! Position	R26.7 A7.7 H20.0
! Orientation	Transversal
! Rotation	0.00 deg
! R >> L	89 mm
! A >> P	64 mm
! F >> H	58 mm

Physio

1st Signal/Mode	None
Dark blood	Off
Resp. control	Off

Composing

Sequence

Introduction	On
Dimension	3D
Elliptical scanning	Off
Asymmetric echo	Off
Contrasts	1
Bandwidth	190 Hz/Px
Flow comp.	No
Echo spacing	8.6 ms
RF pulse type	Fast
Gradient mode	Fast
Excitation	Slab-sel.
RF spoiling	On
FFT Scale Factor	150 %
Morphometry Analysis	Off
FID MoCo Logging	Off
FID Coil Phase Corr.	Off

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LIN/PAR Swap	On
Ext. INV Pulse	On
Flip Angle	1400
Phase Filter	0 px
Uniform Image	On
Head Mask on UNI	Off
T1 Map	On
Complex Div. Image	On
Denoise Weighting	150
FLAWS	Off