

SIEMENS MAGNETOM Verio syngo MR B17

\\USER\projects\imagen_20091016_VB17\imagen, session 2, with BH\localizer

TA: 0:21 PAT: Off Voxel size: 1.1x1.0x7.0 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	Off
Wait for user to start	Off
Start measurements	single

Routine

Slice group 1	
Slices	3
Dist. factor	114 %
Position	Isocenter
Orientation	Sagittal
Phase enc. dir.	A >> P
Rotation	0.00 deg
Slice group 2	
Slices	1
Dist. factor	20 %
Position	Isocenter
Orientation	Transversal
Phase enc. dir.	A >> P
Rotation	0.00 deg
Slice group 3	
Slices	1
Dist. factor	20 %
Position	Isocenter
Orientation	Coronal
Phase enc. dir.	R >> L
Rotation	0.00 deg
Phase oversampling	0 %
FoV read	250 mm
FoV phase	100.0 %
Slice thickness	7.0 mm
TR	8.6 ms
TE	4.00 ms
Averages	2
Concatenations	5
Filter	Distortion Corr.(2D), Prescan Normalize, Elliptical filter
Coil elements	HEA;HEP

Contrast

TD	0 ms
MTC	Off
Magn. preparation	None
Flip angle	20 deg
Fat suppr.	None
Water suppr.	None
Averaging mode	Short term
Reconstruction	Magnitude
Measurements	1
Multiple series	Each measurement

Resolution

Base resolution	256
Phase resolution	90 %

Phase partial Fourier	Off
Interpolation	On
PAT mode	None
Matrix Coil Mode	CP
Image Filter	Off
Distortion Corr. Mode	On
Unfiltered images	2D
Unfiltered images	Off
Prescan Normalize	Off
Normalize	Off
B1 filter	Off
Raw filter	Off
Elliptical filter	On
Mode	Inplane

Geometry

Multi-slice mode	Sequential
Series	Interleaved
Saturation mode	Standard
Special sat.	None
Set-n-Go Protocol	Off
Table position	H
Table position	0 mm
Inline Composing	Off

System

Body	Off
HEP	On
HEA	On
Positioning mode	REF
MSMA	S - C - T
Sagittal	L >> R
Coronal	P >> A
Transversal	F >> H
Coil Combine Mode	Sum of Squares
AutoAlign	---
Auto Coil Select	Default
Shim mode	Tune up
Adjust with body coil	Off
Confirm freq. adjustment	Off
Assume Silicone	Off
? Ref. amplitude 1H	0.000 V
Adjustment Tolerance	Auto
Adjust volume	
Position	Isocenter
Orientation	Transversal
Rotation	0.00 deg
R >> L	350 mm
A >> P	263 mm
F >> H	350 mm

Physio

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

Inline

Subtract	Off
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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
Save original images	On
<hr/>	
Wash - In	Off
Wash - Out	Off
TTP	Off
PEI	Off
MIP - time	Off
<hr/>	

Sequence

Introduction	On
Dimension	2D
Phase stabilisation	Off
Asymmetric echo	Allowed
Contrasts	1
Bandwidth	320 Hz/Px
Flow comp.	No
Allowed delay	0 s
<hr/>	
RF pulse type	Normal
Gradient mode	Normal
Excitation	Slice-sel.
RF spoiling	On

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\\USER\projects\imagen_20091016_VB17\imagen, session 2, with BH\short MPRAGE

TA: 2:45 PAT: 2 Voxel size: 2.2x2.2x1.1 mm Rel. SNR: 1.00 SIEMENS: tfl

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	R4.7 A3.1 H10.8
Orientation	Sagittal
Phase enc. dir.	A >> P
Rotation	0.00 deg
Phase oversampling	0 %
Slice oversampling	0.0 %
Slices per slab	160
FoV read	280 mm
FoV phase	93.8 %
Slice thickness	1.10 mm
TR	2300 ms
TE	2.85 ms
Averages	1
Concatenations	1
Filter	Distortion Corr.(2D), Prescan
	Normalize
Coil elements	HEA;HEP

Contrast

Magn. preparation	Non-sel. IR
TI	900 ms
Flip angle	9 deg
Fat suppr.	None
Water suppr.	None
Averaging mode	Long term
Reconstruction	Magnitude
Measurements	1
Multiple series	Off

Resolution

Base resolution	128
Phase resolution	100 %
Slice resolution	100 %
Phase partial Fourier	Off
Slice partial Fourier	Off
Interpolation	On
PAT mode	GRAPPA
Accel. factor PE	2
Ref. lines PE	24
Accel. factor 3D	1
Matrix Coil Mode	Triple
Reference scan mode	Integrated
Image Filter	Off

Distortion Corr.	On
Mode	2D
Unfiltered images	Off
Unfiltered images	Off
Prescan Normalize	On
Normalize	Off
B1 filter	Off
Raw filter	Off
Elliptical filter	Off

Geometry

Multi-slice mode	Single shot
Series	Interleaved
Set-n-Go Protocol	Off
Table position	H
Table position	11 mm
Inline Composing	Off

System

Body	Off
HEP	On
HEA	On
Positioning mode	ISO
MSMA	S - C - T
Sagittal	L >> R
Coronal	P >> A
Transversal	F >> H
Save uncombined	Off
Coil Combine Mode	Sum of Squares
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	R4.7 A3.1 H10.8
Orientation	Sagittal
Rotation	0.00 deg
F >> H	280 mm
A >> P	263 mm
R >> L	176 mm

Physio

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

Inline

Subtract	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
Save original images	On

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Sequence

Introduction	On
Dimension	3D
Elliptical scanning	Off
Asymmetric echo	Off
Bandwidth	240 Hz/Px
Flow comp.	No
Echo spacing	6.2 ms
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RF pulse type	Fast
Gradient mode	Normal
Excitation	Non-sel.
RF spoiling	On

SIEMENS MAGNETOM Verio syngo MR B17

\\USER\projects\imagen_20091016_VB17\imagen, session 2, with BH\EPI short MID

TA: 11:07 PAT: 2 Voxel size: 3.4x3.4x2.4 mm Rel. SNR: 1.00 SIEMENS: ep2d_bold

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	On
Start measurements	single

Routine

Slice group 1	
Slices	40
Dist. factor	42 %
Position	R4.7 A3.1 H10.8
Orientation	T > C-14.9
Phase enc. dir.	P >> A
Rotation	180.00 deg
Phase oversampling	0 %
FoV read	220 mm
FoV phase	100.0 %
Slice thickness	2.4 mm
TR	2200 ms
TE	30 ms
Averages	1
Concatenations	1
Filter	Prescan Normalize
Coil elements	HEA;HEP

Contrast

MTC	Off
Flip angle	75 deg
Fat suppr.	Fat sat.
Averaging mode	Long term
Reconstruction	Magnitude
Measurements	300
Delay in TR	0 ms
Multiple series	Off

Resolution

Base resolution	64
Phase resolution	100 %
Phase partial Fourier	Off
Interpolation	Off
PAT mode	GRAPPA
Accel. factor PE	2
Ref. lines PE	24
Matrix Coil Mode	CP
Reference scan mode	Separate
Distortion Corr.	Off
Unfiltered images	Off
Prescan Normalize	On
Raw filter	On
Elliptical filter	Off
Hamming	Off

Geometry

Multi-slice mode	Interleaved
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Series

Descending

Special sat.	None
Set-n-Go Protocol	Off
Table position	H
Table position	11 mm
Inline Composing	Off

System

Body	Off
HEP	On
HEA	On
Positioning mode	ISO
MSMA	S - C - T
Sagittal	L >> R
Coronal	P >> A
Transversal	F >> H
Coil Combine Mode	Sum of Squares
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	R4.7 A3.1 H10.8
Orientation	T > C-14.9
Rotation	180.00 deg
R >> L	220 mm
A >> P	220 mm
F >> H	136 mm

Physio

1st Signal/Mode	None
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BOLD

GLM Statistics	Off
Dynamic t-maps	Off
Starting ignore meas	0
Ignore after transition	0
Model transition states	Off
Temp. highpass filter	Off
Threshold	4.00
Paradigm size	20
Meas[1]	Baseline
Meas[2]	Baseline
Meas[3]	Baseline
Meas[4]	Baseline
Meas[5]	Baseline
Meas[6]	Baseline
Meas[7]	Baseline
Meas[8]	Baseline
Meas[9]	Baseline
Meas[10]	Baseline
Meas[11]	Active
Meas[12]	Active
Meas[13]	Active
Meas[14]	Active
Meas[15]	Active
Meas[16]	Active
Meas[17]	Active
Meas[18]	Active

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Meas[19]	Active
Meas[20]	Active
Motion correction	Off
Spatial filter	Off

Sequence

Introduction	Off
Bandwidth	2298 Hz/Px
Free echo spacing	On
Echo spacing	0.52 ms
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EPI factor	64
RF pulse type	Normal
Gradient mode	Fast

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\\USER\projects\imagen_20091016_VB17\imagen, session 2, with BHEPI global

TA: 5:15 PAT: 2 Voxel size: 3.4x3.4x2.4 mm Rel. SNR: 1.00 SIEMENS: ep2d_bold

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	On
Start measurements	single

Routine

Slice group 1	
Slices	40
Dist. factor	42 %
Position	R4.7 A3.1 H10.8
Orientation	T > C-14.9
Phase enc. dir.	P >> A
Rotation	180.00 deg
Phase oversampling	0 %
FoV read	220 mm
FoV phase	100.0 %
Slice thickness	2.4 mm
TR	2200 ms
TE	30 ms
Averages	1
Concatenations	1
Filter	Prescan Normalize
Coil elements	HEA;HEP

Contrast

MTC	Off
Flip angle	75 deg
Fat suppr.	Fat sat.
Averaging mode	Long term
Reconstruction	Magnitude
Measurements	140
Delay in TR	0 ms
Multiple series	Off

Resolution

Base resolution	64
Phase resolution	100 %
Phase partial Fourier	Off
Interpolation	Off
PAT mode	GRAPPA
Accel. factor PE	2
Ref. lines PE	24
Matrix Coil Mode	CP
Reference scan mode	Separate
Distortion Corr.	Off
Unfiltered images	Off
Prescan Normalize	On
Raw filter	On
Elliptical filter	Off
Hamming	Off

Geometry

Multi-slice mode	Interleaved
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Series

Descending

Special sat.	None
Set-n-Go Protocol	Off
Table position	H
Table position	11 mm
Inline Composing	Off

System

Body	Off
HEP	On
HEA	On
Positioning mode	ISO
MSMA	S - C - T
Sagittal	L >> R
Coronal	P >> A
Transversal	F >> H
Coil Combine Mode	Sum of Squares
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	R4.7 A3.1 H10.8
Orientation	T > C-14.9
Rotation	180.00 deg
R >> L	220 mm
A >> P	220 mm
F >> H	136 mm

Physio

1st Signal/Mode	None
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BOLD

GLM Statistics	Off
Dynamic t-maps	Off
Starting ignore meas	0
Ignore after transition	0
Model transition states	Off
Temp. highpass filter	Off
Threshold	4.00
Paradigm size	20
Meas[1]	Baseline
Meas[2]	Baseline
Meas[3]	Baseline
Meas[4]	Baseline
Meas[5]	Baseline
Meas[6]	Baseline
Meas[7]	Baseline
Meas[8]	Baseline
Meas[9]	Baseline
Meas[10]	Baseline
Meas[11]	Active
Meas[12]	Active
Meas[13]	Active
Meas[14]	Active
Meas[15]	Active
Meas[16]	Active
Meas[17]	Active
Meas[18]	Active

SIEMENS MAGNETOM Verio syngo MR B17

Meas[19]	Active
Meas[20]	Active
Motion correction	Off
Spatial filter	Off

Sequence

Introduction	Off
Bandwidth	2298 Hz/Px
Free echo spacing	On
Echo spacing	0.52 ms
<hr/>	
EPI factor	64
RF pulse type	Normal
Gradient mode	Fast

SIEMENS MAGNETOM Verio syngo MR B17

\\USER\projects\imagen_20091016_VB17\imagen, session 2, with BH\EPI BH calibration

TA: 5:50 PAT: 2 Voxel size: 3.4x3.4x2.4 mm Rel. SNR: 1.00 SIEMENS: ep2d_bold

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	On
Start measurements	single

Routine

Slice group 1	
Slices	40
Dist. factor	42 %
Position	R4.7 A3.1 H10.8
Orientation	T > C-14.9
Phase enc. dir.	P >> A
Rotation	180.00 deg
Phase oversampling	0 %
FoV read	220 mm
FoV phase	100.0 %
Slice thickness	2.4 mm
TR	2200 ms
TE	30 ms
Averages	1
Concatenations	1
Filter	Prescan Normalize
Coil elements	HEA;HEP

Contrast

MTC	Off
Flip angle	75 deg
Fat suppr.	Fat sat.
Averaging mode	Long term
Reconstruction	Magnitude
Measurements	156
Delay in TR	0 ms
Multiple series	Off

Resolution

Base resolution	64
Phase resolution	100 %
Phase partial Fourier	Off
Interpolation	Off
PAT mode	GRAPPA
Accel. factor PE	2
Ref. lines PE	24
Matrix Coil Mode	CP
Reference scan mode	Separate
Distortion Corr.	Off
Unfiltered images	Off
Prescan Normalize	On
Raw filter	On
Elliptical filter	Off
Hamming	Off

Geometry

Multi-slice mode	Interleaved
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Series

Descending

Special sat.	None
Set-n-Go Protocol	Off
Table position	H
Table position	11 mm
Inline Composing	Off

System

Body	Off
HEP	On
HEA	On
Positioning mode	ISO
MSMA	S - C - T
Sagittal	L >> R
Coronal	P >> A
Transversal	F >> H
Coil Combine Mode	Sum of Squares
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	R4.7 A3.1 H10.8
Orientation	T > C-14.9
Rotation	180.00 deg
R >> L	220 mm
A >> P	220 mm
F >> H	136 mm

Physio

1st Signal/Mode	None
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BOLD

GLM Statistics	Off
Dynamic t-maps	Off
Starting ignore meas	0
Ignore after transition	0
Model transition states	Off
Temp. highpass filter	Off
Threshold	4.00
Paradigm size	20
Meas[1]	Baseline
Meas[2]	Baseline
Meas[3]	Baseline
Meas[4]	Baseline
Meas[5]	Baseline
Meas[6]	Baseline
Meas[7]	Baseline
Meas[8]	Baseline
Meas[9]	Baseline
Meas[10]	Baseline
Meas[11]	Active
Meas[12]	Active
Meas[13]	Active
Meas[14]	Active
Meas[15]	Active
Meas[16]	Active
Meas[17]	Active
Meas[18]	Active

SIEMENS MAGNETOM Verio syngo MR B17

Meas[19]	Active
Meas[20]	Active
Motion correction	Off
Spatial filter	Off

Sequence

Introduction	Off
Bandwidth	2298 Hz/Px
Free echo spacing	On
Echo spacing	0.52 ms
<hr/>	
EPI factor	64
RF pulse type	Normal
Gradient mode	Fast

SIEMENS MAGNETOM Verio syngo MR B17

\\USER\projects\imagen_20091016_VB17\imagen, session 2, with BH\B0 map

TA: 0:45

Voxel size: 4.0x4.0x4.0 mm

Rel. SNR: 1.00

SIEMENS: gre_field_mapping

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	On
Start measurements	single

Routine

Slice group 1	
Slices	36
Dist. factor	0 %
Position	R4.7 A3.1 H10.8
Orientation	T > C-14.9
Phase enc. dir.	R >> L
Rotation	90.00 deg
Phase oversampling	0 %
FoV read	256 mm
FoV phase	87.5 %
Slice thickness	4.0 mm
TR	378 ms
TE 1	4.63 ms
TE 2	7.09 ms
Averages	1
Concatenations	1
Filter	Raw filter
Coil elements	HEA;HEP

Contrast

MTC	Off
Flip angle	40 deg
Fat suppr.	None
Averaging mode	Short term
Reconstruction	Magn./Phase
Measurements	1
Multiple series	Each measurement

Resolution

Base resolution	64
Phase resolution	100 %
Phase partial Fourier	Off
Interpolation	Off
Matrix Coil Mode	Auto (CP)
Image Filter	Off
Distortion Corr.	Off
Prescan Normalize	Off
Normalize	Off
B1 filter	Off
Raw filter	On
Intensity	Medium
Slope	48
Elliptical filter	Off

Geometry

Multi-slice mode	Interleaved
Series	Interleaved

Special sat.	None
Set-n-Go Protocol	Off
Table position	H
Table position	11 mm
Inline Composing	Off

System

Body	Off
HEP	On
HEA	On
Positioning mode	FIX
MSMA	S - C - T
Sagittal	L >> R
Coronal	P >> A
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	R4.7 A3.1 H10.8
Orientation	T > C-14.9
Rotation	90.00 deg
A >> P	256 mm
R >> L	224 mm
F >> H	144 mm

Composing

Sequence

Introduction	On
Dimension	2D
Asymmetric echo	Off
Contrasts	2
Bandwidth	260 Hz/Px
Flow comp.	Yes
RF pulse type	Normal
Gradient mode	Fast
RF spoiling	On

SIEMENS MAGNETOM Verio syngo MR B17

\\USER\projects\imagen_20091016_VB17\imagen, session 2, with BH\DTI

TA: 13:00 PAT: 2 Voxel size: 2.4x2.4x2.4 mm Rel. SNR: 1.00 SIEMENS: ep2d_diff

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	On
Start measurements	single

Routine

Slice group 1	
Slices	60
Dist. factor	0 %
Position	Isocenter
Orientation	Transversal
Phase enc. dir.	P >> A
Rotation	180.00 deg
Phase oversampling	0 %
FoV read	307 mm
FoV phase	100.0 %
Slice thickness	2.4 mm
TR	1000 ms
TE	104 ms
Averages	1
Concatenations	20
Filter	Raw filter, Prescan Normalize
Coil elements	HEA;HEP

Contrast

MTC	Off
Magn. preparation	None
Fat suppr.	Fat sat.
Averaging mode	Long term
Reconstruction	Magnitude
Delay in TR	0 ms
Multiple series	Off

Resolution

Base resolution	128
Phase resolution	100 %
Phase partial Fourier	Off
Interpolation	Off
PAT mode	GRAPPA
Accel. factor PE	2
Ref. lines PE	24
Matrix Coil Mode	Auto (Triple)
Reference scan mode	Separate
Distortion Corr.	Off
Prescan Normalize	On
Raw filter	On
Intensity	Strong
Slope	64
Elliptical filter	Off
Hamming	Off

Geometry

Multi-slice mode	Interleaved
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Series

Special sat.	None
Set-n-Go Protocol	Off
Table position	H
Table position	0 mm
Inline Composing	Off

System

Body	Off
HEP	On
HEA	On
Positioning mode	REF
MSMA	S - C - T
Sagittal	R >> L
Coronal	A >> P
Transversal	F >> H
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	Isocenter
Orientation	Transversal
Rotation	180.00 deg
R >> L	307 mm
A >> P	307 mm
F >> H	144 mm

Physio

1st Signal/Mode	Pulse/Trigger
Average cycle	7534 ± 0 ms
Acquisition window	15000 ms
Trigger pulse	1
Trigger delay	0 ms
Phases	1
Resp. control	Off

Diff

Diffusion mode	Free
Diff. weightings	1
b-value	1300 s/mm ²
Diff. weighted images	On
Trace weighted images	Off
Average ADC maps	Off
Individual ADC maps	Off
FA maps	Off
Mosaic	Off
Tensor	Off
Noise level	40
Diff. directions	36

Sequence

Introduction	Off
Bandwidth	1860 Hz/Px
Free echo spacing	On
Echo spacing	0.60 ms

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EPI factor	128
RF pulse type	Normal
Gradient mode	Fast