```
Geometry
                            = SENSE-head
Coil selection
                            = SENSE
     coil mode
     connection
                            = d
Multi coil
                             = no
Homogeneity correction
                            = none
CLEAR
                             = no
FOV (mm)
                             = 250.00
                            = 100.00
RFOV (%)
Foldover suppression
                            = no
Matrix scan
                            = 256
       reconstruction
                            = 256
Scan percentage (%)
                            = 50.00
SENSE
                             = no
Stacks
                             = 3
                             = A
    current
    type
                            = parallel
    slices
                            = 3
    slice thickness (mm) = 10.00
    slice thickness (mm) = 10.00

slice gap = user defined
gap (mm) = 10.00

slice orientation = sagittal

foldover direction = AP

fat shift direction = F
    use geometry
                            = none
Slice scan order
                            = default
Stack scan order
                            = ascend
                            = no
Move table per stack
Stack alignment
                             = no
Stack display order
                            = no
PlanAlign
                            = no
REST slabs
                            = 0
Catheter tracking
                            = no
Catheter tracking
Interactive positioning = no
Allow table movement = no
Patient position = head first
        orientation
                            = supine
Contrast
Scan mode
                            = M2D
                             = FFE
    technique
                            = T1
Contrast enhancement
                             = cartesian
Acquisition mode
                            = TFE
Fast Imaging mode
    shot mode
                            = multi-shot
TFE factor
                            = 42
    startup echoes
                            = default
                            = shortest
    shot interval
                            = linear
    profile order
Echoes
                            = no
   partial echo
    shifted echo
                            = no
                            = shortest
Flip angle (deg)
                            = 20.00
TR
                             = user defined
```

```
= 15.00
    (ms)
Half Scan
                         = no
Water fat shift
                          = maximum
Shim
                          = no
SPIR
                          = no
SPAIR
                         = no
TFE prepulse
                         = invert
   slice selection
                         = no
    shared
                          = no
   delay
                          = shortest
ProSet
                          = no
MTC
                         = no
T2prep
                         = no
Research prepulse
                         = no
diffusion mode
                         = no
SAR mode
                         = high
B1 mode
                         = default
gradient mode
                         = regular
SofTone mode
                         = no
Motion
Cardiac synchronisation
                         = no
Respiratory compensation
                          = no
Navigator respiratory comp = no
Flow compensation
                        = no
fMRI echo stabilisation
                        = no
NSA
                          = 1
Dyn/ang
Angio
                          = no
Quantitative flow
                          = no
Manual start
                          = no
Dynamic study
                         = no
Flow labelling
                         = none
Postproc
Preparation phases
                         = auto
B0 field map
MIP/MPR
                          = no
Images
                          =
     0: M no no no
                         = M
Autoview image
Reference tissue
                         = White matter
                       - ...
= soft
- immed
Preset window contrast
Reconstruction mode
                         = immediate
Save raw data
                         = no
Push to workstation
                         = no
Hardcopy protocol
                         = no
Ringing filtering
                         = no
Offc/ang
Stacks
                          = 3
    current
                         = A
                        = -20.00
Stack Offc. AP (P=+mm)
           RL (L=+mm)
                         = 0.00
           FH (H=+mm)
                         = 0.00
     Ang. AP (deg)
                          = 0.00
```

```
RL (deg) = 0.00
FH (deg) = 0.00

Info

SAR (W/kg) / SAR level = 0.3 / 0

Total scan duration = 00:17.4

Measured voxel size M / P / S (mm) = 0.98 / 1.98 / 10.0

Reconstructed voxel size M / P / S (mm) = 0.98 / 0.98 / 10.0

Actual scan percentage (%) = 49.2

TFE shots = 3

TFE shot duration (ms) / TFE acq duration (ms) = 697.1 / 630.0

TFE shot interval (ms) = 697.1

Minimum prepulse TI delay = 372.8

Act. Water fat shift (pixels) / Act. BW per pixel (Hz) = 1.161 / 187.1

Min. Water fat shift (pixels) / Max. BW per pixel (Hz) = 0.522 / 415.8

Act. TR / TE (ms) = 15 / 5.2

Min. TR / TE (ms) = 10 / 5.2

Relative signal level RSL (%) = 100.0
```

# ADNI , ADNI\_SH , Ref/SHC Geometry

Patient position = head first orientation = supine
Respiratory compensation = no

Respiratory compensation = no NSA = 3 Manual start = no

#### Contrast

Coil mode = SENSE = d Coil connection Foldover suppression = no Stack Offc. AP (P=+mm) = 0.00RL (L=+mm) = 0.00FH (H=+mm) = 0.00= head first Patient position = supine orientation

Respiratory compensation = no
NSA = 3
Manual start = no

#### Motion

Coil mode = SENSE Coil connection = dFoldover suppression = no Stack Offc. AP (P=+mm) = 0.00= 0.00RL (L=+mm) = 0.00 FH (H=+mm) = head first Patient position orientation = supine Respiratory compensation = no

Respiratory compensation = no NSA = 3 Manual start = no

### Dyn/ang

= SENSE Coil mode = dCoil connection Foldover suppression = no Stack Offc. AP (P=+mm) = 0.00RL (L=+mm) = 0.00FH (H=+mm) = 0.00= head first Patient position orientation = supine

Respiratory compensation = no NSA = 3 Manual start = no

## Postproc

Coil mode = SENSE

```
Patient position = head first orientation = supine
Respiratory compensation = no
                             = 3
Manual start
                              = no
Offc/ang
Coil mode
                            = SENSE
Coil connection
                             = d
Foldover suppression = no

Stack Offc. AP (P=+mm) = 0.00

RL (L=+mm) = 0.00

FH (H=+mm) = 0.00
Patient position = head first orientation = supine
Respiratory compensation = no
                             = 3
Manual start
                              = no
Tnfo
SAR (W/kg) / SAR level = 0.3 / 0
Total scan duration = 00:50.6
Total scan duration = 00:50.6 Measured voxel size M / P / S (mm) = 4.69 / 6.00 / 6.00
Reconstructed voxel size M / P / S (mm) = 4.69 / 4.69 / 3.00
Actual scan percentage (%) = 78.1
Number of packages
                              = 1
Act. Water fat shift (pixels) / Act. BW per pixel (Hz) = 0.110 / 1973.9
Min. Water fat shift (pixels) / Max. BW per pixel (Hz) = 0.083 / 2604.2
Act. TR / TE (ms)
                       = 8.0 / 0.81
```

Relative signal level RSL (%) = 100.0

```
Geometry
Coil selection
                          = SENSE-head
    coil mode
                          = SENSE
     connection
                          = d
FOV (mm)
                          = 240.00
                          = 100.00
RFOV (%)
Foldover suppression
                         = no
Matrix scan
                          = 192
                       = 256
      reconstruction
Scan percentage (%)
                         = 100.00
SENSE
                         = yes
   P reduction (AP)
                         = 1.00
                         = 1.00
    S reduction (RL)
Overcontiguous slices
Stacks
                          = 1
   slices
                          = 170
   slice thickness (mm) = 1.20
    slice orientation = sagittal
    foldover direction
                         = AP
    fat shift direction
                          = F
   use geometry
                          = none
Chunks
PlanAlign
                          = no
REST slabs
                          = 0
Catheter tracking
                         = no
Interactive positioning = no
Allow table movement = no
Patient position
Patient position
                          = head first
       orientation
                          = supine
Contrast
                         = 3D
Scan mode
   technique
                          = FFE
                        = T1
= cartesian
Contrast enhancement
Acquisition mode
Fast Imaging mode
                        = TFE
= multi-shot
   shot mode
TFE factor
                         = 192
                       = default
= user defined
   startup echoes
shot interval
                          = 2300.00
        (ms)
    profile order
                         = linear
    turbo direction
                          = Y
Echoes
                          = 1
   partial echo
                          = no
    shifted echo
                          = no
                          = user defined
TE
                          = 4.00
    (ms)
                         = 8.00
Flip angle (deg)
                          = shortest
Half Scan
                          = no
Water fat shift
                         = maximum
Shim
                          = no
SPIR
                           = no
```

```
SPAIR
                            = no
TFE prepulse
                            = invert
                           = no
    slice selection
                            = user defined
    delay
                           = 1000.00
        (ms)
ProSet
                            = no
MTC
                            = no
T2prep
                            = no
Research prepulse
                            = no
diffusion mode
                             = no
                           = high
SAR mode
B1 mode
                           = default
gradient mode
                           = default
SofTone mode
                            = no
Motion
Cardiac synchronisation
                           = no
Respiratory compensation = no
Navigator respiratory comp = no
                          = no
Flow compensation
fMRI echo stabilisation
                           = no
NSA
                            = 1
Dyn/ang
Angio
                            = no
Quantitative flow
                           = no
Manual start
                           = no
Dynamic study
                           = no
Flow labelling
                           = none
Postproc
Preparation phases
                          = auto
B0 field map
                            = no
MIP/MPR
                            = no
Images

0: M no no no
Autoview image = M
Reference tissue = White matter
Preset window contrast = soft
Exerctruction mode = immediate
Save raw data
                            = no
                          = no
Push to workstation
                            = no
Hardcopy protocol
Ringing filtering
                            = yes
Offc/ang
Stacks
                            = 1
Stack Offc. AP (P=+mm)
                           = 0.00
            RL (L=+mm)
                            = 0.00
                            = 0.00
            FH (H=+mm)
                            = 0.00
      Ang. AP (deg)
                            = 0.00
            RL (deg)
                            = 0.00
            FH (deg)
SAR (W/kg) / SAR level = 0.1 / 0
Total scan duration = 07:11.9
```

```
Measured voxel size M / P / S (mm) = 1.25 / 1.25 / 1.20 Reconstructed voxel size M / P / S (mm) = 0.94 / 0.94 / 1.20 Actual scan percentage (%) = 100.0 TFE shots = 187 TFE shot duration (ms) / TFE acq duration (ms) = 1833.9 / 1654.5 Minimum prepulse TI delay = 864.3 Act. Water fat shift (pixels) / Act. BW per pixel (Hz) = 1.322 / 164.2 Min. Water fat shift (pixels) / Max. BW per pixel (Hz) = 0.250 / 868.1 Act. TR / TE (ms) = 8.6 / 4.0 Min. TR / TE (ms) = 8.6 / 3.0 Relative signal level RSL (%) = 100.0
```

```
ADNI , ADNI_SH , Double_TSE
Geometry
Coil selection
                         = SENSE-head
    coil mode
                         = SENSE
    connection
                         = d
FOV (mm)
                         = 240.00
                         = 88.00
RFOV (%)
Foldover suppression
                          = no
Matrix scan
                         = 256
                         = 256
      reconstruction
Scan percentage (%)
                         = 100.00
SENSE
                         = yes
   P reduction (RL)
                         = 1.00
Stacks
                          = 1
   type
                         = parallel
   slices
                         = 48
    slice thickness (mm) = 3.00
                  = user defined
    slice gap
                         = 0.00
         gap (mm)
    slice orientation
                         = transverse
   foldover direction
                        = RL
    fat shift direction
                        = P
   use geometry
                         = none
Minimum number of packages = 1
Slice scan order
                        = default
PlanAlign
                         = no
REST slabs
                         = 0
Catheter tracking
                          = no
Interactive positioning = no
Allow table movement = no
Patient position
Patient position
                         = head first
       orientation
                         = supine
Contrast
                         = MS
Scan mode
   technique
                         = SE
                        = no
Modified SE
                        = cartesian
= TSE
Acquisition mode
Fast Imaging mode
                         = 10
TSE factor
                         = 0
    startup echoes
                         = default
   profile orders
   DRIVE
                          = no
   ultrashort
                         = no
Echoes
                         = 2
   partial echo
                         = no
                         = user defined
TE first
                         = 12.00
          (ms)
                         = 96.00
   second (ms)
                         = 90.00
Flip angle (deg)
                         = no
Refocusing control
TR
                         = user defined
    (ms)
                         = 3000.00
Half Scan
                         = no
Water fat shift
                       = maximum
```

```
Shim
                          = no
SPIR
                          = no
SPAIR
                          = no
BB pulse
                          = no
ProSet
                          = no
MTC
                          = no
Research prepulse
                         = no
Zoom imaging
                         = no
diffusion mode
                          = no
SAR mode
                          = low
                        = default
B1 mode
gradient mode
                        = regular
SofTone mode
                         = no
Motion
Cardiac synchronisation
                         = no
                        = no
Respiratory compensation
Navigator respiratory comp = no
Flow compensation
                     = no
Temporal slice spacing
                        = default
NSA
                          = 1
Dyn/ang
Manual start
                          = no
Dynamic study
                          = no
Flow labelling
                          = none
Postproc
Preparation phases
                         = auto
B0 field map
                          = no
MIP/MPR
                          = no
Images
     0: M no no no
Autoview image
                         = M
Calculated images
    0: no no no no
Reference tissue
                          = White matter
Preset window contrast
                          = soft
                         = immediate
Reconstruction mode
Save raw data
                         = no
Push to workstation
                         = no
Hardcopy protocol
                         = no
Offc/ang
Stacks
                          = 1
Stack Offc. AP (P=+mm)
                         = 0.00
           RL (L=+mm)
                         = 0.00
           FH (H=+mm)
                         = 0.00
     Ang. AP (deg)
                          = 0.00
           RL (deg)
                          = 0.00
           FH (deg)
                          = 0.00
Info
SAR (W/kg) / SAR level
                        = 1.1 / 0
Total scan duration
                         = 06:45.0
Measured voxel size M / P / S (mm) = 0.94 / 0.95 / 3.00
Reconstructed voxel size M / P / S (mm) = 0.94 / 0.94 / 3.00
```

```
Actual scan percentage (%) = 98.2

Number of packages = 3

Minimum slice gap = 3.00

Optimal number of slices = 42

Maximum number of slices = 63

Water fat shift (pixels) / BW per pixel (Hz) = 1.323 / 164.1

TSE echo spacing / shot duration (ms) = 12.0 / 120

Min. TR (ms) = 2201

Relative signal level RSL (%) = 100.0
```