



Radlink-Siemens User Manual

Hip

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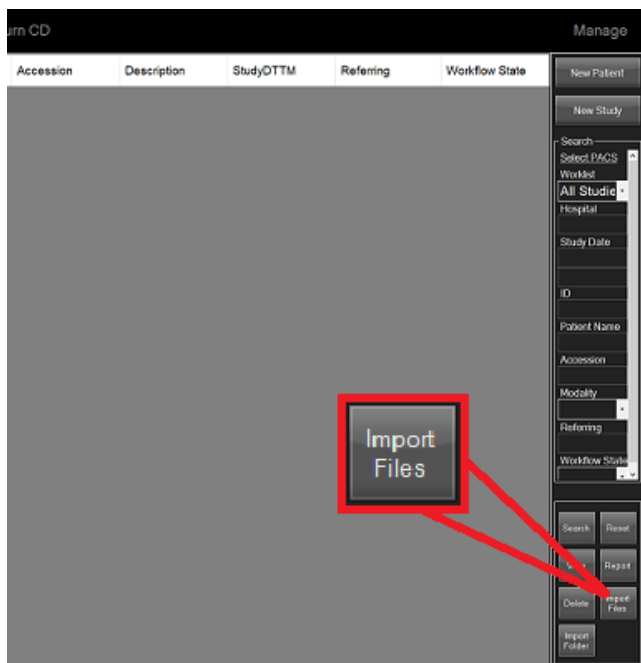
Patient Set Up

Reminder: Make sure Radlink and Siemens systems load the same patient data

1. Software will automatically launch into Radlink Pro Imaging Software:

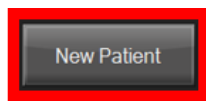
Option 1: Import patient image via USB

Option 2: Capture pre-op image via Panoramic Software



Option 1:

1. Click "Import Files".
2. Select the DICOM files to import.
3. Click "Start".
4. After the import has completed, click "Close".



Option 2:

1. Create new patient.
2. Enter patient information, click "Next".
3. Follow steps for Panoramic Software.

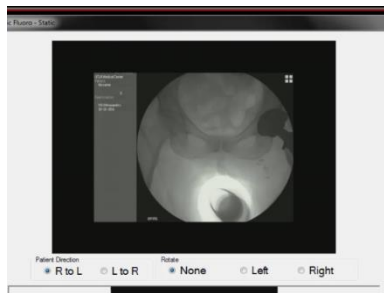
Panoramic Software

IMAGE ACQUISITION

1. Center scout shot with arm at 10cm to verify rotation.
2. Extend/ Shorten the arm to take 3 shots:



1. AP **right hip** center shot



2. AP **pubic symphysis** centered shot

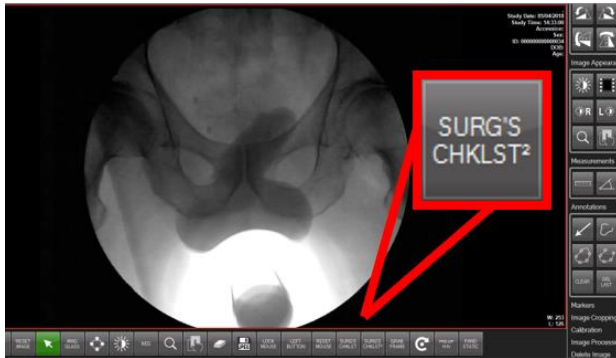


3. AP **left hip** center shot

IMAGE TRANSFER AND STITCHING

1. Click the “Pano Static” hot button.
2. Select image of **right hip**. Click “Grab Frame”.
3. Select image of **pubic symphysis**. Click “Grab Frame”.
4. Select image of **left hip**. Click “Grab Frame”.
5. Click “Save” to save the image once stitching has completed. The progress bar in the Pano window will indicate when stitching is complete.

PRE-OP ANTERIOR

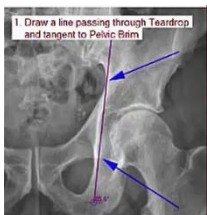


1. Obtain image via options 1 or 2 listed above.
2. Launch **Surgeon's Checklist 2**.
3. Select **"Pre-Op Hip Anterior Approach"**. Select operative side.

SURGEON'S CHECKLIST SOFTWARE



1. **Click and drag** to draw **teardrop line** as instructed.



2. **Click and drag** to draw **teardrop brim line** as instructed.



3. Select the operative side of the obturator, **outline the obturator** as instructed. Click **"Click here when done"**.
4. Click **"Proceed to checklist for Cup"**.

INTRA-OP ANTERIOR



1. **C-Arm:** Take an AP Hip of operative side. Make sure teardrop is visible.
2. Launch **Surgeon's Checklist 2**.
3. Select **"Intra-op Anterior Approach (Cup)"**. Select operative side.

SURGEON'S CHECKLIST SOFTWARE

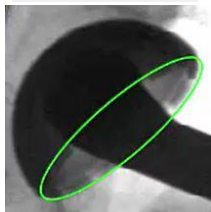
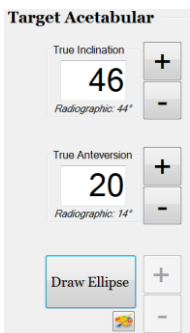
1. **Position patient.** Verify patient's position as instructed. Click **"Next"**.
2. If adjustment is needed, adjust patient's position or C-Arm, shoot an X-ray, click **"Grab X-ray"**, repeat the step until an ideal image is captured.
3. **Click and drag** to draw a line from **teardrop to pelvic brim** as instructed.



4. The **Pre-Op Teardrop-Brim line angle** should automatically be applied to the image. If the angle DID NOT automatically apply, enter the Pre-Op Teardrop-Brim line angle manually in the white box.

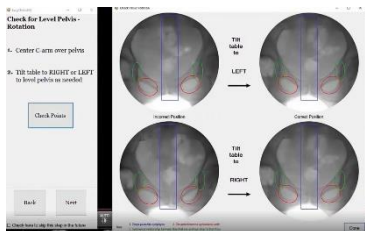


5. Click **"Overlay Obturator"**, then click on the center of the obturator as instructed. Verify whether the shape of the obturator matches.

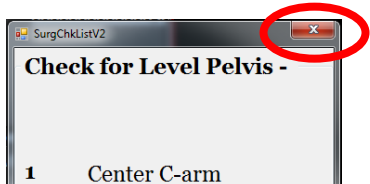


Proceed to
Checklist
for stem

6. If adjustment is needed, adjust patient's position or C-Arm, shoot an X-ray, then Click "**Grab X-ray**", repeat the step until the shape of the obturator matches.
7. Set **True Inclination** and **True Anteversion goal**.
8. Click "**Draw Ellipse**", align Ellipse to match the cup or utilize "**+**" and "**-**" tools for inclination, anteversion and size adjustment.
9. Click "**Proceed to Checklist for Stem**".



10. Verify patient's current position matches the information listed on the page. Click "**Check Points**" for illustration.

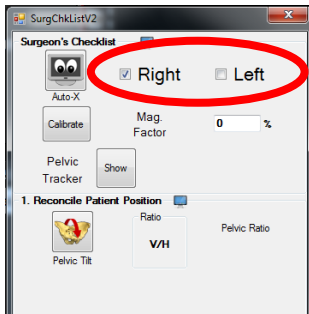


11. Close **Surgeon's Checklist 2**.

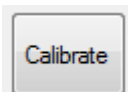
12. Create panoramic pelvis (Please refer to "**PANORAMIC SOFTWARE**" on page 2).



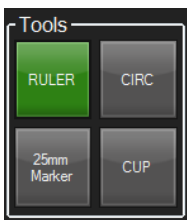
13. Click **Surgeon's Checklist 2: – "Intra-Op Hip Posterior Approach"**.



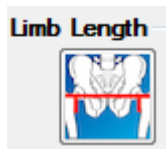
14. Make sure the operative side is selected.



15. If a known size object is in the image, select **“Calibrate”**.



16. Select a tool on the right top screen to measure the object. Enter known size by millimeter. Click **“OK”**, the image is now calibrated.

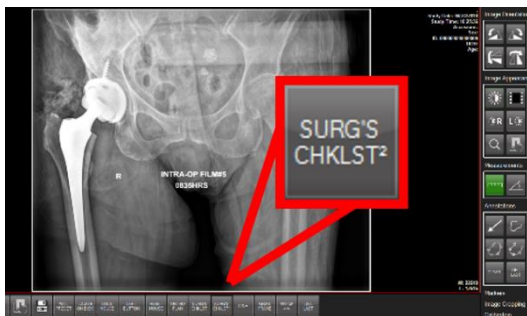


17. Select **“Limb Length”**, follow the prompt. Click and drag the end of the line to fine tune the measurement if needed.



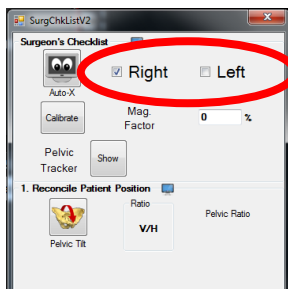
18. Select **“Offset”**, follow the prompt. Click and drag the end of the line to fine tune the measurement if needed.

PRE-OP POSTERIOR

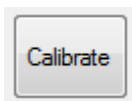


1. Obtain image via options 1 or 2 listed above.
2. Launch **Surgeon's Checklist 2**.
3. Select **"Pre-op Posterior Approach"**.

SURGEON'S CHECKLIST SOFTWARE



1. Make sure the operative side is selected.



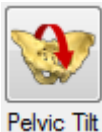
2. If a known size object is in the image, click **"Calibrate"**.



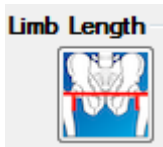
3. Select a tool on the right top screen to measure the object. Enter known size by millimeter. Click **"Ok"**, the image is now calibrated.



4. Select **"Auto-X"**, follow the prompt, then wait for software to analyze the image, automatically.



5. Select **"Pelvic Tilt"**, the measurement should appear. **Click and drag** the end of the line to fine tune the measurement if needed.



6. Select “**Limb Length**”, the measurement should appear. **Click and drag** the end of the line to fine tune the measurement if needed.



7. Select “**Offset**”, the measurement should appear. **Click and drag** the end of the line to fine tune the measurement if needed.

Posterior Approach

Surgeon’s Checklist 2 software

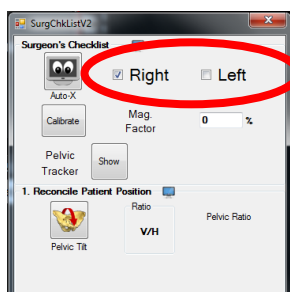
Total Hip Arthroplasty

INTRA-OP POSTERIOR

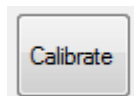


1. Create panoramic pelvis (Please refer to “**PANORAMIC SOFTWARE** on page 2).
2. Launch **Surgeon’s Checklist 2**.
3. Select “**Intra-Op Hip Posterior Approach**”.

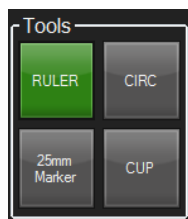
SURGEON’S CHECKLIST SOFTWARE



1. Make sure the operative side is selected.



2. If a known size object is in the image. Click “**Calibrate**”.



3. Select a tool on the right top screen. Measure the object. Enter known size by millimeter. Click “**OK**”, the image is now calibrated.



Auto-X



Rotation



Pelvic Tilt



Detect Cup



Limb Length



Offset



4. Select “**Auto-X**”, follow the prompt, then wait for software to analyze the image, automatically.
5. Select “**Rotation**”, the measurement should appear. **Click and drag** the end of the line to fine tune the measurement if needed.
6. Select “**Pelvic Tilt**”, the measurement should appear. **Click and drag** the end of the line to fine tune the measurement if needed.
7. Select “**Detect Cup**”, the measurement should appear. **Click and drag** the ellipse to align with the cup if needed.
8. Click “**+**” or “**-**” next to **Anteversion** and **Abduction** to fine tune the measurement if needed.
9. Select “**Limb Length**”, the measurement should appear. **Click and drag** the end of the line to fine tune the measurement if needed.
10. Select “**Offset**”, the measurement should appear. **Click and drag** the end of the line to fine tune the measurement if needed.
11. **If any measurements did not appear after clicking, follow the prompt on the software.**

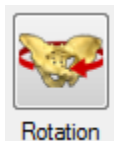
PERIACETABULAR OSTEOTOMY



1. Create panoramic pelvis (Please refer to “**PANORAMIC SOFTWARE**” on page 2).
2. Launch **Surgeon's Checklist 2**.
3. Select “**PAO**”.

SURGEON'S CHECKLIST SOFTWARE

1. Make sure the operative side is selected.



2. Select “**Rotation**”. Follow the prompts to click the correct points. **Click and drag** the end of the lines to fine tune the measurement if needed.



3. Select “**Pelvic Tilt**”. Follow the prompts to click the correct points. **Click and drag** the end of the lines to fine tune the measurement if needed.



4. Select “**Center Edge Angle**”. Follow the prompt to click the correct point. **Click and drag** the edge of the circle to outline the socket and angle lines to connect the outside sourcil endpoint.

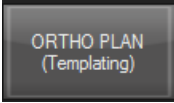


5. Select “**Tonnis Angle**”. **Click and drag** the end of the angle lines to connect the two sourcil endpoints.

Ortho Plan

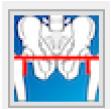
Total Hip Arthroplasty

TEMPLATING



ORTHO PLAN
(Templating)

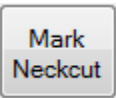
1. Launch **Ortho Plan (Templating)**
2. Select Right or Left side for the Operative side.
3. Select **Magnification Factor** 15%, 18%, 20% or select Custom to go to calibration page to select other options such as 25mm Marker, Ruler, Circle, Cup or 0% magnification for measurement.
4. Wait for Auto-X pre-processing to complete.
5. Select **“LLD”**, the measurement should appear. **Click and drag** the end of the line to fine tune the measurement if needed. Click **“Accept”** when done.
6. Select the **Target LLD**.
7. Select **“Offset”**, the measurement should appear. **Click and drag** the end of the line to fine tune the measurement if needed.
8. Select the **Target Offset**.
9. Select **“Femoral Head”**. **Click and drag** the edge of the circle to fine tune the measurement if needed. Click **“Accept”** when done.
10. Select **“Auto Select”** under **Acetabular**. Adjust Cup Size and Position if needed.
11. Select **“Auto Select”** under **Femoral Component**. Adjust Size, Offset, Type, and Head if needed.
12. Adjust the stem template with different fit options, matching the green circle and blue circle on the stem to achieve templated LLD/Offset matching the targeted LLD/Offset.
13. Click the small Monitor button next to **Head**.
14. Select **“Mark Lesser”**. Click the lesser trochanter on the patient image.
15. Select **“Mark Neckcut”**. Click the extension of Neck Resection line on the patient image.



Auto
Select







Mark
Lesser

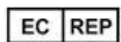


Mark
Neckcut

Safety Signs and Symbols

	Conformité Européenne (CE Mark Clearance)
	Radlink's CE Mark Clearance from Notified Body 0123 Notified Body: TÜV SÜD Product Service GmbH, Ridlerstr. 65. 80339, Munich, Germany
	Radlink European Union Representative
	Name and Address of Manufacturer

European Representative Information



MDSS GmbH
Schiffgraben 41
30175 Hannover, Germany



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Intended Use

The Radlink Pro Imaging software can manipulate/post-process images, overlay lines/measurements/templates, store images, and transmit images to other PACS destinations.

For questions, contact Radlink Technical Support:

support@radlink.com

+1(310)643-6900, ext. 2

Mon-Fri, 6:00 a.m. – 5:00 p.m. PST