



# Evolut Clinical Guideline 2042 for Pelvis Computed Tomography (CT)

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## TABLE OF CONTENTS

<b>STATEMENT .....</b>	<b>3</b>
GENERAL INFORMATION.....	3
PURPOSE.....	3
SPECIAL NOTE.....	3
<b>INDICATIONS FOR PELVIS CT.....</b>	<b>3</b>
PELVIC PAIN FOR UNKNOWN ETIOLOGY.....	3
INFLAMMATION AND INFECTION .....	4
HERNIA.....	4
MUSCULOSKELETAL INDICATIONS .....	5
OTHER INDICATIONS.....	5
<i>When MRI is Contraindicated or Cannot Be Performed</i> .....	6
EVALUATION OF KNOWN OR SUSPECTED NON-AORTIC VASCULAR DISEASE .....	7
SUSPECTED MALIGNANCY.....	7
KNOWN MALIGNANCY .....	7
<b>PREOPERATIVE OR POSTOPERATIVE ASSESSMENT .....</b>	<b>7</b>
<b>FURTHER EVALUATION OF INDETERMINATE FINDINGS.....</b>	<b>8</b>
<b>COMBINATION STUDIES FOR KNOWN GENETIC CONDITIONS.....</b>	<b>8</b>
CHEST/ABDOMEN/PELVIS CT .....	8
<b>OTHER COMBINATION STUDIES WITH PELVIS CT.....</b>	<b>8</b>
PELVIS CTA (OR MRA) AND PELVIS CT .....	8
COMBINATION STUDIES FOR MALIGNANCY FOR INITIAL STAGING OR RESTAGING.....	9
<b>CODING AND STANDARDS .....</b>	<b>9</b>
CODES .....	9
APPLICABLE LINES OF BUSINESS .....	9
<b>BACKGROUND .....</b>	<b>9</b>
*CONSERVATIVE THERAPY .....	9
**HOME EXERCISE PROGRAM (HEP) .....	9
CONTRAINDICATIONS AND PREFERRED STUDIES .....	10



<b>SUMMARY OF EVIDENCE .....</b>	<b>10</b>
<b>ANALYSIS OF EVIDENCE .....</b>	<b>11</b>
<b>POLICY HISTORY .....</b>	<b>12</b>
<b>LEGAL AND COMPLIANCE .....</b>	<b>12</b>
GUIDELINE APPROVAL .....	12
<i>Committee</i> .....	12
DISCLAIMER .....	12
<b>REFERENCES.....</b>	<b>14</b>

## STATEMENT

### General Information

- *It is an expectation that all patients receive care/services from a licensed clinician. All appropriate supporting documentation, including recent pertinent office visit notes, laboratory data, and results of any special testing must be provided. If applicable: All prior relevant imaging results and the reason that alternative imaging cannot be performed must be included in the documentation submitted.*
- *Where a specific clinical indication is not directly addressed in this guideline, medical necessity determination will be made based on widely accepted standard of care criteria. These criteria are supported by evidence-based or peer-reviewed sources such as medical literature, societal guidelines and state/national recommendations.*
- *The guideline criteria in the following sections were developed utilizing evidence-based and peer-reviewed resources from medical publications and societal organization guidelines as well as from widely accepted standard of care, best practice recommendations.*

### Purpose

Pelvis Computed Tomography (CT) uses radiation to generate images of the organs and structures in the pelvis. Pelvic imaging begins at the umbilicus or iliac crests and extends to the level of the lesser trochanters.

### Special Note

**Note:** PELVIS CT is used for diseases suspected to be limited to the pelvis. CT Abdomen/Pelvis Combo (CPT Codes: 74176, 74177, 74178) is the correct study when the indication(s) include both the abdomen **AND** pelvis, such as CTU (CT Urography), CTE (CT Enterography), acute abdominal pain, widespread inflammatory disease or neoplasm.

When separate requests for CT abdomen and CT Pelvis are encountered for processes involving both the abdomen and pelvis, they need to be resubmitted as a single Evolent Clinical Guideline 2001 for Abdomen CT/Evolent Clinical Guideline 2042 for Pelvis CT (to avoid unbundling).

## INDICATIONS FOR PELVIS CT

### Pelvic Pain for Unknown Etiology

- CT allowed after initial workup is inconclusive and must include results of the following <sup>(1)</sup>:
  - Initial imaging, such as ultrasound, scope study, or x-ray **AND**
  - Appropriate laboratory testing (chemistry profile, complete blood count, and urinalysis)

- For acute pelvic pain in a patient over the age of 65 <sup>(2)</sup>

## Inflammation and Infection <sup>(3,4)</sup>

- Fistula
  - Suspected perianal fistula or occult anorectal abscess <sup>(5)</sup>
  - For patients with recurrent fistula in anal or perianal Crohn's disease when MRI is contraindicated or cannot be performed <sup>(6)</sup>
  - Any history of fistula limited to the pelvis that requires re-evaluation or is suspected to have recurred
- Infection
  - Suspected infection in the pelvis (based on elevated WBC, fever, anorexia, or nausea and vomiting)
  - Complications of diverticulitis limited to the pelvis (prior imaging study is not required for diverticulitis diagnosis) with severe abdominal pain or severe tenderness or mass, not responding to antibiotic treatment
  - Any known infection to have created an abscess in the pelvis that requires re-evaluation
- Stricture
  - Suspected urethral stricture or periurethral pathology after initial evaluation with cystoscopy or urethroscopy and additional imaging is needed (such as for suspected malignancy, diverticula, fistula or extensive fibrosis **OR** for preoperative planning)
- Fluid Collection
  - Abnormal fluid collection seen on prior imaging that needs follow-up evaluation and limited to the pelvis

## Hernia <sup>(7)</sup>

- Suspected hernia and one of the following:
  - Deep pelvic hernia (obturator, sciatic or perineal)
  - Recurrent groin hernia **AND** exam and ultrasound are non-diagnostic or equivocal
- Known or suspected inguinal, obturator, sciatic perineal hernia with suspected complications based on one or more of the following:
  - Symptoms such as severe pain, vomiting, diarrhea or blood in stool
  - Exam findings such as inability to reduce hernia, severe tenderness, guarding, rebound
  - Complication is suggested on prior imaging
- Known pelvic or groin hernia and imaging is needed for surgical planning

## Musculoskeletal Indications

### When MRI is Contraindicated or Cannot Be Performed

- Known or suspected aseptic/avascular necrosis of hip(s) after completion of initial x-ray<sup>(8)</sup> (CT or MRI can be approved for surgical planning)
- Sacroiliitis (infectious or inflammatory, such as Ankylosing Spondylitis/Spondyloarthropathies) after completion of x-ray and rheumatology workup<sup>(9)</sup>
- Persistent musculoskeletal pelvic pain (including sacroiliac joint dysfunction and piriformis syndrome) with **ALL** of the following<sup>(10,11)</sup>:
  - Initial x-ray completed
  - Pain is unresponsive to four (4) weeks of active conservative treatment received within the past six (6) months (physical therapy, chiropractic care or physician supervised home exercise plan (HEP))
- Evaluation of both hips when the patient meets hip CT guidelines (x-ray + persistent pain unresponsive to conservative treatment) for both the right and left hip, Pelvis CT is the preferred study
  - If labral tear is suspected due to a positive anterior impingement sign or posterior impingement sign, then bilateral hip CTs are the preferred studies (not Pelvis CT)
  - If bilateral hip arthrograms are requested and otherwise meet guidelines, bilateral hip MRIs are the preferred studies (not Pelvis CT)
- When non-diagnostic imaging is requested for anatomic guidance for hip surgery, a CT Pelvis is approvable since measurements of both hips may be needed (only one non-diagnostic request can be approved and should include the surgical site)
- Further evaluation of congenital anomalies of the sacrum and pelvis after initial imaging has been performed
- Evaluation of physical or radiological evidence of complex or occult pelvic fracture or for pre-operative planning of complex pelvic fractures

## Other Indications

- Diffuse, unexplained lower extremity edema with negative or inconclusive ultrasound<sup>(12)</sup>
- Further evaluation of a new onset or non-reducible varicocele<sup>(13)</sup>
- Suspected pelvic congestion syndrome (including May-Thurner and nutcracker syndromes) when ultrasound is indeterminate<sup>(14)</sup>
- To locate an intrauterine device after ultrasound and plain x-ray are equivocal or non-diagnostic (imaging of the abdomen may also be indicated)<sup>(15)</sup>
- Diagnosis or to guide treatment of urachal anomalies when ultrasound is non-diagnostic<sup>(16)</sup>
- Prior to solid organ transplantation

## ***When MRI is Contraindicated or Cannot Be Performed***

- Follow-up of an indeterminate or inconclusive finding on ultrasound limited to the pelvis
- Evaluation of undescended testes in adults and in children, including determination of location of testes, if ordered by a specialist <sup>(17)</sup>
- Evaluation and characterization of uterine and adnexal masses, (e.g., fibroids, ovaries, tubes, and uterine ligaments) or congenital uterine or renal abnormality where ultrasound has been done previously <sup>(1)</sup>
- Evaluation of abnormal uterine bleeding when ultrasound findings are indeterminate <sup>(18)</sup>
  - Age ≤ 50 – Vascular stalk or focal doppler signal on US
  - Age > 50 – Thickened endometrium, vascular stalk or focal doppler signal on US
- Evaluation of uterus prior to and after embolization (CTA may be approved in addition to CT for preprocedural planning) <sup>(19)</sup>
- Evaluation of endometriosis when preliminary imaging has been completed or to follow up known endometriosis <sup>(20)</sup>
- Further evaluation of suspected adenomyosis when ultrasound is inconclusive, such as the following <sup>(21)</sup>:
  - Uterine abnormality on US
    - Anechoic spaces/cysts in myometrium
    - Heterogeneous echotexture
    - Obscured endometrial/myometrial border
    - Sub-endometrial echogenic linear striations
    - Thickening of the transition zone
    - Uterine wall thickening
- Prior to uterine surgery if there is an abnormality suspected on prior ultrasound
- Suspected placenta accreta or percreta when ultrasound is indeterminate <sup>(22)</sup>
- Further assessment of a scrotal or penile mass when ultrasound is inconclusive <sup>(23)</sup>
- Investigation of a malfunctioning penile prosthesis
- Suspected urethral diverticula and other imaging is inconclusive <sup>(24,25)</sup>
- Suspected patent urachus or other urachal abnormalities when ultrasound is non-diagnostic <sup>(16)</sup>
- Transient or episodic hematospermia and age ≥ 40 with negative or inconclusive ultrasound <sup>(26,27)</sup>
- Persistent hematospermia (duration > 1 month, any age) with negative or inconclusive ultrasound <sup>(27)</sup>

## Evaluation of Known or Suspected Non-Aortic Vascular Disease

- Follow-up for post-endovascular repair (EVAR) or open repair of iliac artery aneurysms (28–30)
  - Routine, baseline study (post-op/intervention) after EVAR:
    - Within the first month of the procedure
    - Continued follow-up at the following intervals:
      - If no endoleak or sac enlargement is seen:
        - ◆ Annually monitor with ultrasound
          - ◇ When US is abnormal or insufficient CT/MR can be used to monitor annually
        - ◆ Every 5 years monitor with CT/MR
      - If type II endoleak is seen at any point in time:
        - ◆ Every 6 months x 2 years, then annually (does not require US)
- If symptomatic or imaging shows increasing, or new findings related to stent graft – more frequent imaging may be needed

## Suspected Malignancy

- Initial evaluation of suspicious pelvic masses/tumors found only in the pelvis by physical exam and ultrasound has been performed

## Known Malignancy

- Surveillance: One follow-up exam to ensure no suspicious change has occurred in a tumor in the pelvis. No further surveillance CT unless tumor(s) are specified as highly suspicious, or change was found on exam or last follow-up imaging
- For abnormal incidental pelvic lymph nodes when follow-up is recommended based on prior imaging (initial 3-month follow-up) <sup>(31)</sup>

## PREOPERATIVE OR POSTOPERATIVE ASSESSMENT

When not otherwise specified in the guideline:

Preoperative Evaluation:

- Imaging of the area requested is needed to develop a surgical plan

Postoperative Evaluation:

- Known or suspected complications
- A clinical reason is provided how imaging may change management

**NOTE:** This section applies only within the first few months following surgery

## **FURTHER EVALUATION OF INDETERMINATE FINDINGS**

Unless follow-up is otherwise specified within the guideline

- For initial evaluation of an inconclusive finding on a prior imaging report (i.e., x-ray, ultrasound or CT) that requires further clarification
- One follow-up exam of a prior indeterminate MR/CT finding to ensure no suspicious interval change has occurred. (No further surveillance unless specified as highly suspicious or change was found on last follow-up exam.)

## **COMBINATION STUDIES FOR KNOWN GENETIC CONDITIONS**

**NOTE:** When medical necessity is met for an individual study **AND** conscious sedation is required (such as for young pediatric patients or patients with significant developmental delay), the entire combination is indicated)

### **Chest/Abdomen/Pelvis CT**

- Multiple Endocrine Neoplasia type 1 (MEN1): Annually starting at age 8 <sup>(32,33)</sup>

**NOTE:** Every 3 years include Brain MRI

## **OTHER COMBINATION STUDIES WITH PELVIS CT**

**NOTE:** When medical necessity is met for an individual study **AND** conscious sedation is required (such as for young pediatric patients or patients with significant developmental delay), the entire combination is indicated)

### **Pelvis CTA (or MRA) and Pelvis CT**

- When needed for clarification of vascular involvement from tumor (including suspected renal vein thrombosis) <sup>(34)</sup>
- Prior to uterine artery embolization for fibroids <sup>(35)</sup>

## Combination Studies for Malignancy for Initial Staging or Restaging

Unless otherwise specified in this guideline, indication for combination studies for malignancy for initial staging or restaging:

- Concurrent studies to include CT or MRI of any of the following areas as appropriate depending on the cancer: Abdomen, Brain, Chest Neck, Pelvis, Cervical Spine, Thoracic Spine or Lumbar Spine.

## CODING AND STANDARDS

### Codes

72192, 72193, 72194, +0722T

### Applicable Lines of Business

☒	CHIP (Children’s Health Insurance Program)
☒	Commercial
☒	Exchange/Marketplace
☒	Medicaid
☒	Medicare Advantage

## BACKGROUND

### \*Conservative Therapy

This should include a multimodality approach consisting of a combination of active and inactive components. Inactive components, such as rest, ice, heat, modified activities, medical devices, acupuncture and/or stimulators, medications, injections (epidural, facet, bursal, and/or joint, not including trigger point), and diathermy can be utilized. Active modalities may consist of physical therapy, a physician-supervised home exercise program\*\*, and/or chiropractic care.

### \*\*Home Exercise Program (HEP)

The following elements are required to meet guidelines for completion of conservative therapy:

- Information provided on exercise prescription/plan **AND**
- Follow-up with member with documentation provided regarding lack of improvement

(failed) after completion of HEP (after suitable 4-week period), or inability to complete HEP due to physical reason - i.e., increased pain, inability to physically perform exercises. (Patient inconvenience or noncompliance without explanation does not constitute “inability to complete” HEP).

- Dates and duration of failed PT, physician-supervised HEP, or chiropractic treatment should be documented in the original office notes or an addendum to the notes.

## Contraindications and Preferred Studies

- Contraindications and reasons why a CT/CTA cannot be performed may include impaired renal function, significant allergy to IV contrast, pregnancy (depending on trimester)
- Contraindications and reasons why an MRI/MRA cannot be performed may include: impaired renal function, claustrophobia, non-MRI compatible devices (such as non-compatible defibrillator or pacemaker), metallic fragments in a high-risk location, patient exceeds weight limit/dimensions of MRI machine

## SUMMARY OF EVIDENCE

### ACR Appropriateness Criteria® Acute Pelvic Pain in the Reproductive Age Group: 2023 Update <sup>(1)</sup>

**Study Design:** This document is a guideline update by the American College of Radiology (ACR) focusing on the initial imaging in the reproductive age adult population with acute pelvic pain.

**Target Population:** The target population includes patients with acute pelvic pain, both with positive and negative beta-human chorionic gonadotropin (b-hCG) levels, and suspected gynecological and non-gynecological etiologies.

**Key Factors:** The guideline emphasizes the use of transabdominal and transvaginal pelvic ultrasound with Doppler as initial imaging. It also discusses the appropriateness of CT and MRI in different scenarios based on the suspected etiology.

### Diagnostic imaging of acute abdominal pain in adults <sup>(3)</sup>

**Study Design:** This document is a review article that provides evidence-based guidelines for the diagnostic imaging of acute abdominal pain in adults.

**Target Population:** The target population includes adults presenting with acute abdominal pain in both outpatient and emergency settings.

**Key Factors:** The article outlines the appropriate imaging modalities based on the location of pain and clinical presentation. It highlights the use of ultrasonography for right upper quadrant pain, CT for right or left lower quadrant pain, and the limited diagnostic value of conventional radiography.

### **ACR Appropriateness Criteria® Hernia <sup>(7)</sup>**

**Study Design:** This document is a guideline by the ACR focusing on the initial imaging of suspected abdominopelvic hernias.

**Target Population:** The target population includes adults with signs or symptoms prompting suspicion of abdominopelvic hernia.

**Key Factors:** The guideline discusses the use of CT, ultrasound, and MRI as first-line imaging modalities for evaluating hernias. It also addresses the appropriateness of different imaging techniques based on the type of hernia suspected.

### **2022 ACC/AHA Guideline for the Diagnosis and Management of Aortic Disease: A Report of the American Heart Association/American College of Cardiology Joint Committee on Clinical Practice Guidelines <sup>(29)</sup>**

**Study Design:** This document is a comprehensive guideline by the American College of Cardiology (ACC) and American Heart Association (AHA) for the diagnosis and management of aortic disease.

**Target Population:** The target population includes patients with aortic disease across multiple clinical presentation subsets (asymptomatic, stable symptomatic, and acute aortic syndromes).

**Key Factors:** The guideline covers various aspects such as genetic evaluation, family screening, medical therapy, endovascular and surgical treatment, and long-term surveillance. It emphasizes the role of multidisciplinary aortic teams and shared decision-making in the management of aortic disease.

## **ANALYSIS OF EVIDENCE**

### **Analysis <sup>(1,3,7,29)</sup>:**

In summary, CT with contrast is widely recognized for its diagnostic accuracy and detailed anatomical assessment in various conditions affecting the pelvis. However, considerations such as radiation exposure and the specific clinical context (e.g., pregnancy, type of condition) influence the choice of imaging modality.

### **Shared Conclusions:**

- **CT with Contrast:** All articles agree that CT with contrast is highly valuable for detailed anatomical assessment and is appropriate for evaluating various conditions, including acute pelvic pain, hernias, and aortic disease.
- **Sensitivity and Specificity:** CT is consistently noted for its high sensitivity and specificity in diagnosing conditions such as appendicitis, diverticulitis, and hernias.
- **Radiation Exposure:** There is a shared concern about radiation exposure, particularly in reproductive-age women and pregnant patients.

## POLICY HISTORY

Date	Summary
July 2025	<ul style="list-style-type: none"> <li>Added a Summary of Evidence and Analysis of Evidence</li> </ul>
June 2025	<ul style="list-style-type: none"> <li>This guideline replaces Evolent Clinical Guideline 036 for Pelvis CT</li> <li>Added in general information statement regarding guideline criteria development by reputable sources, standard of care, and best practices</li> <li>Revised purpose</li> <li>Hernia and musculoskeletal pelvic pain sections revised</li> <li>Genetics imaging and malignancy sections revised</li> <li>Updated language in the preoperative/postoperative section</li> <li>Segment added to combinations studies about if the required use of conscious sedation is needed the entire combination is indicated</li> <li>Applicable Line of Business adjusted – Medicare checked</li> <li>References updated</li> </ul>
June 2024	<ul style="list-style-type: none"> <li>Revised the purpose</li> <li>Clarified contraindications vs MRI and CT use</li> <li>Combination studies were aligned across other guidelines</li> </ul>

## LEGAL AND COMPLIANCE

### Guideline Approval

#### **Committee**

Reviewed / Approved by Evolent Specialty Services Clinical Guideline Review Committee

#### **Disclaimer**

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*Evolent Clinical Guidelines are comprehensive and inclusive of various procedural applications for each service type. Our guidelines may be used to supplement Medicare criteria when such criteria is not fully established. When Medicare criteria is determined to not be fully established, we only reference the relevant portion of the corresponding Evolent Clinical Guideline that is applicable to the specific service or item requested in order to determine medical necessity.*

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