



## **Cohere Medical Policy – Intrathecal Pain Pumps**

*Clinical Policy for Medical Necessity Review*

**Version: 3**

**Cohere Health UMC Approval Date: July 10, 2025**

Last Annual Review: July 10, 2025

Revision: Not Applicable

Next Annual Review: July 10, 2026

# Important Notices

## Notices & Disclaimers:

**GUIDELINES ARE SOLELY FOR COHERE'S USE IN PERFORMING MEDICAL NECESSITY REVIEWS AND ARE NOT INTENDED TO INFORM OR ALTER CLINICAL DECISION-MAKING OF END USERS.**

Cohere Health, Inc. ("**Cohere**") has published these clinical guidelines to determine the medical necessity of services (the "**Guidelines**") for informational purposes only, and solely for use by Cohere's authorized "**End Users**". These Guidelines (and any attachments or linked third-party content) are not intended to be a substitute for medical advice, diagnosis, or treatment directed by an appropriately licensed healthcare professional. These Guidelines are not in any way intended to support clinical decision-making of any kind; their sole purpose and intended use is to summarize certain criteria Cohere may use when reviewing the medical necessity of any service requests submitted to Cohere by End Users. Always seek the advice of a qualified healthcare professional regarding any medical questions, treatment decisions, or other clinical guidance. The Guidelines, including any attachments or linked content, are subject to change at any time without notice.

© 2025 Cohere Health, Inc. All Rights Reserved.

## Other Notices:

HCPCS® and CPT® copyright 2025 American Medical Association. All rights reserved.

Fee schedules, relative value units, conversion factors and/or related components are not assigned by the AMA, are not part of CPT, and the AMA is not recommending their use. The AMA does not directly or indirectly practice medicine or dispense medical services. The AMA assumes no liability for data contained or not contained herein.

HCPCS and CPT are registered trademarks of the American Medical Association.

## Policy Information:

**Specialty Area:** Musculoskeletal Care

**Policy Name:** Cohere Medical Policy - Intrathecal Pain Pumps

**Type:** ☒ Adult (18+ yo) | ☒ Pediatric (0-17 yo)

## **Table of Contents**

|                                            |           |
|--------------------------------------------|-----------|
| <b>Important Notices</b>                   | <b>2</b>  |
| <b>Medical Necessity Criteria</b>          | <b>4</b>  |
| <b>Service: Intrathecal Pain Pumps</b>     | <b>4</b>  |
| Description                                | 5         |
| Medical Necessity Criteria                 | 5         |
| Indications                                | 5         |
| Non-Indications                            | 6         |
| Level of Care Criteria                     | 7         |
| Procedure Codes (CPT/HCPCS)                | 7         |
| <b>Medical Evidence</b>                    | <b>11</b> |
| <b>References</b>                          | <b>12</b> |
| <b>Policy Revision History/Information</b> | <b>14</b> |

# Medical Necessity Criteria

## ***Service: Intrathecal Pain Pumps***

Cohere Health takes an evidence-based approach to reviewing imaging and procedure requests, meaning that sufficient clinical information must be provided at the time of submission to determine medical necessity. Documentation must include a recent and detailed history, physical examination related to the onset or change in symptoms, relevant lab results, prior imaging, and details of previous treatments. Advanced imaging or procedures should be requested after a clinical evaluation by the treating provider, which may include referral to a specialist.

- When a specific clinical indication is not explicitly addressed in the Cohere Health medical policy, medical necessity will be determined based on established clinical best practices, as supported by evidence-based literature, peer-reviewed sources, professional society guidelines, and state or national recommendations, unless otherwise directed by the health plan.
- Requests submitted without clinical documentation, or those that do not align with the provided clinical information—such as mismatched procedure, laterality, body part, or CPT code—may be denied for lack of medical necessity due to insufficient or inconsistent clinical information.
- When there are multiple diagnostic or therapeutic procedures requested simultaneously or within the past three months, each will be reviewed independently. Clinical documentation must clearly justify all of the following:
  - The medical necessity of each individual request
  - Why prior imaging or procedures were inconclusive, or why additional/follow-up studies are needed
  - How the results will impact patient management or treatment decisions
- Requests involving adjacent or contiguous body parts may be considered not medically necessary if the documentation demonstrates that the patient's primary symptoms can be adequately assessed with a single study or procedure.

## **Description**

An intrathecal drug delivery system (IDDS) involves a surgically implanted pump that delivers medication; the system includes a pump, medication reservoir, and catheter. Once programmed, the pump delivers a set amount of medication via a catheter into the intrathecal space of the spinal canal. Intrathecal drug therapies include opioid medications and nonopioid medications (e.g., baclofen, ziconotide, local anesthetics).<sup>1</sup>

## **Medical Necessity Criteria**

### **Indications**

An **intrathecal pain pump** is considered appropriate if **ANY** of the following is **TRUE**:

- Anti-spasmodic drugs (e.g., baclofen) for intractable spasticity with **ALL** of the following<sup>2</sup>:
  - Non-invasive methods of spasm control (e.g., oral anti-spasmodic drugs) are not effective due to **ANY** of the following:
    - Failure to adequately control the spasticity; **OR**
    - Intolerable side effects; **AND**
  - Before pump implantation, the patient must have responded favorably with a 50% improvement of function or spasticity to a trial intrathecal dose of the anti-spasmodic drug; **OR**
- Opioid and non-opioid drugs for the treatment of chronic, intractable pain of malignant or non-malignant origin with **ALL** of the following<sup>1,3-6</sup>:
  - Any drug(s) used to fill the implantable infusion pump must be appropriate for the treatment of the patient's pain condition; **AND**
  - Origin of pain is **ANY** of the following:
    - Malignant with **ALL** of the following:
      - Life expectancy greater than 3 months; **AND**
      - History indicates there was not an adequate response to non-invasive methods of pain control; **OR**
    - Non-malignant and unresponsive to less invasive medical therapy as indicated by **ALL** of the following:
      - Duration of conservative care of greater than 3 months with **ALL** of the following:
        - Physical therapy; **AND**
        - Interventional pain injections if medically appropriate; **AND**
        - Medication including systemic opioids; **AND**

- Evaluation with a multidisciplinary physician team that includes **ALL** of the following:
    - Psychological evaluation by a licensed mental health professional; **AND**
    - Surgery is not indicated; **OR**
- Permanent intrathecal pain pump with **ALL** of the following:
  - Completion of a preliminary trial of intraspinal opioid or non-opioid drug administration with or without a temporary catheter (e.g., intrathecal, epidural); **AND**
  - Evidence of at least 50% potential pain relief with the procedure (e.g., trial); **AND**
  - Minimal side effects and patient tolerance<sup>7,8</sup>; **OR**
- Replacement or revision of a covered device\* is medically necessary with **ANY** of the following:
  - Device is not functioning, and the rationale is documented in the chart (e.g., pump interrogation report, imaging reports, pump flow study); **OR**
  - Device recalled by the manufacturer; **OR**
  - Notification was received from the pump indicating an impending failure.

## Non-Indications

An **intrathecal pain pump** is not considered appropriate if **ANY** of the following is **TRUE**:

- Presence of a known allergy or hypersensitivity to the drug being used (e.g., oral baclofen, morphine, etc.); **OR**
- Active infection<sup>2</sup>; **OR**
- The patient's body size is insufficient to support the weight and bulk of the device<sup>2</sup>; **OR**
- Replacement of a device for **ANY** of the following:
  - The entire implantable infusion system, including the catheter and/or programmer components, at the end of battery life; **OR**
  - Upgrade to newer technology when the current device is functional.

\*NOTE: A covered device includes the device-pump/battery, programmer, catheter, and extensions. Documentation should include which component(s) require replacement.

\*NOTE: If the patient has another implanted programmable device, and due to crosstalk between devices that may inadvertently change the prescription, all devices should be checked for possible crosstalk at the time of implantation of the infusion pump, with appropriate continued surveillance for such interactions.

### **Level of Care Criteria**

Inpatient or Outpatient

### **Procedure Codes (CPT/HCPCS)**

| <b>CPT/HCPCS Code</b> | <b>Code Description</b>                                                                                                                                                                                                                                                                                                                                           |
|-----------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 62323                 | Injection(s), of diagnostic or therapeutic substance(s) (e.g., anesthetic, antispasmodic, opioid, steroid, other solution), not including neurolytic substances, including needle or catheter placement, interlaminar epidural or subarachnoid, lumbar or sacral (caudal); with imaging guidance (i.e., fluoroscopy or CT)                                        |
| 62324                 | Injection(s), including indwelling catheter placement, continuous infusion or intermittent bolus, of diagnostic or therapeutic substance(s) (e.g., anesthetic, antispasmodic, opioid, steroid, other solution), not including neurolytic substances, interlaminar epidural or subarachnoid, cervical or thoracic; without imaging guidance                        |
| 62325                 | Injection(s), including indwelling catheter placement, continuous infusion or intermittent bolus, of diagnostic or therapeutic substance(s) (e.g., anesthetic, antispasmodic, opioid, steroid, other solution), not including neurolytic substances, interlaminar epidural or subarachnoid, cervical or thoracic; with imaging guidance (i.e., fluoroscopy or CT) |
| 62326                 | Injection(s), including indwelling catheter placement, continuous infusion or intermittent bolus,                                                                                                                                                                                                                                                                 |

|       |                                                                                                                                                                                                                                                                                                                                                                        |
|-------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
|       | of diagnostic or therapeutic substance(s) (e.g., anesthetic, antispasmodic, opioid, steroid, other solution), not including neurolytic substances, interlaminar epidural or subarachnoid, lumbar or sacral (caudal); without imaging guidance                                                                                                                          |
| 62327 | Injection(s), including indwelling catheter placement, continuous infusion or intermittent bolus, of diagnostic or therapeutic substance(s) (e.g., anesthetic, antispasmodic, opioid, steroid, other solution), not including neurolytic substances, interlaminar epidural or subarachnoid, lumbar or sacral (caudal); with imaging guidance (i.e., fluoroscopy or CT) |
| 62350 | Implantation, revision or repositioning of tunneled intrathecal or epidural catheter, for long-term medication administration via an external pump or implantable reservoir/infusion pump; without laminectomy                                                                                                                                                         |
| 62351 | Implantation, revision or repositioning of tunneled intrathecal or epidural catheter, for long-term medication administration via an external pump or implantable reservoir/infusion pump; with laminectomy                                                                                                                                                            |
| 62355 | Removal of previously implanted intrathecal or epidural catheter                                                                                                                                                                                                                                                                                                       |
| 62360 | Implantation or replacement of device for intrathecal or epidural drug infusion; subcutaneous reservoir                                                                                                                                                                                                                                                                |
| 62361 | Implantation or replacement of device for intrathecal or epidural drug infusion; nonprogrammable pump                                                                                                                                                                                                                                                                  |
| 62362 | Implantation or replacement of device for intrathecal or epidural drug infusion; programmable                                                                                                                                                                                                                                                                          |

|       |                                                                                                                                                                                                                                                                                             |
|-------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
|       | pump, including preparation of pump, with or without programming                                                                                                                                                                                                                            |
| 62365 | Removal of subcutaneous reservoir or pump, previously implanted for intrathecal or epidural infusion                                                                                                                                                                                        |
| 62367 | Electronic analysis of programmable, implanted pump for intrathecal or epidural drug infusion (includes evaluation of reservoir status, alarm status, drug prescription status); without reprogramming or refill                                                                            |
| 62368 | Electronic analysis of programmable, implanted pump for intrathecal or epidural drug infusion (includes evaluation of reservoir status, alarm status, drug prescription status); with reprogramming                                                                                         |
| 62369 | Electronic analysis of programmable, implanted pump for intrathecal or epidural drug infusion (includes evaluation of reservoir status, alarm status, drug prescription status); with reprogramming and refill                                                                              |
| 62370 | Electronic analysis of programmable, implanted pump for intrathecal or epidural drug infusion (includes evaluation of reservoir status, alarm status, drug prescription status); with reprogramming and refill (requiring skill of a physician or other qualified health care professional) |
| 95990 | Refilling and maintenance of implantable pump or reservoir for drug delivery, spinal (intrathecal, epidural) or brain (intraventricular), includes electronic analysis of pump, when performed;                                                                                             |
| 95991 | Refilling and maintenance of implantable pump or reservoir for drug delivery, spinal (intrathecal,                                                                                                                                                                                          |

|       |                                                                                                                                                                         |
|-------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
|       | epidural) or brain (intraventricular), includes electronic analysis of pump, when performed; requiring skill of a physician or other qualified health care professional |
| C1772 | Infusion pump, programmable (implantable)                                                                                                                               |
| C1891 | Infusion pump, non-programmable, permanent (implantable)                                                                                                                |
| C2626 | Infusion pump, non-programmable, temporary (implantable)                                                                                                                |
| E0782 | Infusion pump, implantable, non-programmable (includes all components, e.g., pump, catheter, connectors, etc.)                                                          |
| E0783 | Infusion pump system, implantable, programmable (includes all components, e.g., pump, catheter, connectors, etc.)                                                       |
| E0785 | Implantable intraspinal (epidural/intrathecal) catheter used with implantable infusion pump, replacement                                                                |
| E0786 | Implantable programmable infusion pump, replacement (excludes implantable intraspinal catheter)                                                                         |

# Medical Evidence

Schultz et al. (2021) also analyzed data from the Product Surveillance Registry (PSR). The study included 4646 patients with chronic, non-malignant pain who received a drug delivery system. Adverse events, product performance, and device replacement were discussed. The literature supports the use of drug delivery systems as an option instead of systemic opioids.<sup>4</sup>

Stearns et al. (2020) analyzed data from a prospective, long-term, multicenter registry of patients who received an intrathecal drug delivery system (IDDS) for cancer-related pain. The PSR included 1403 patients with cancer from 2003, when the registry began, through July 2017. Common cancer types were lung, breast, colon/rectal, pancreatic, and prostate. Improved pain levels and higher quality of life scores were demonstrated, including patients with late-stage cancer. Efficacy was demonstrated in randomized controlled clinical trials (RCTs), yet overall utilization is low.<sup>3</sup>

Carvajal et al. (2018) performed an observational study of patients diagnosed with pancreatic cancer; prevalence rates of pain range from 47% to 82%. The Results from 11 years of data were analyzed using an IDDS. A total of 10,300 IDDS days were analyzed. Before IDDS implantation, severe pain was reported (median presurgical numeric rating scale [NRS], 8 [interquartile range, 7-9]) despite receiving a daily dose of oral morphine of 360 mg. Concerning the median overall survival (OS), post-intrathecal treatment initiation was 82 days (95% confidence interval, 59-95). After implant surgery, the median OS was 91 days (83-111) for implanted pumps and 27 days (20-49) for external pumps ( $P < .0001$ ). Patients reported significant pain relief as evidenced by a notable reduction in pain scores at 1 week, 1 month, and 3 months post-implantation ( $P < .001$ ). Severe pain (NRS score  $\geq 7$ ) also decreased from 89.2% before surgery to 4.5% after 1 week, 6.7% after 1 month, and 10.3% after 3 months of IDDS implantation ( $P < .01$ ). Rates of complications were low and aligned with existing literature findings. The authors suggest that a long-term IDDS is effective and safe for managing refractory pancreatic cancer pain.<sup>9</sup>

Aman et al. (2021) emphasized that the American Society of Pain and Neuroscience (ASPN) Best Practices and Guidelines support the interventional management of cancer-associated pain with intrathecal drug delivery systems.<sup>10</sup>

## References

1. American Society of Anesthesiologists (ASA) Task Force on Chronic Pain Management; American Society of Regional Anesthesia and Pain Medicine (ASRAPM). Practice guidelines for chronic pain management: An updated report by the American Society of Anesthesiologists Task Force on Chronic Pain Management and the American Society of Regional Anesthesia and Pain Medicine. *Anesthesiology*. 2010 Apr;112(4):810–33. doi:10.1097/ALN.0b013e3181c43103
2. North American Spine Society (NASS). NASS coverage policy recommendations: Intrathecal drug delivery systems. Published March 2017. <https://www.spine.org/>
3. Stearns LM, Abd-Elseyed A, Perruchoud C, et al. Intrathecal drug delivery systems for cancer pain: An analysis of a prospective, multicenter product surveillance registry. *Anesth Analg*. 2020 Feb;130(2):289–297. doi:10.1213/ANE.0000000000004425
4. Schultz DM, Abd-Elseyed A, Calodney A, et al. Targeted drug delivery for chronic nonmalignant pain: Longitudinal data from the Product Surveillance Registry. *Neuromodulation*. 2021 Oct;24(7):1167–1175. doi:10.1111/ner.13353
5. National Comprehensive Cancer Network (NCCN). NCCN clinical practice guidelines in oncology: Adult cancer pain (ver. 2.2025). Updated May 21, 2025. [https://www.nccn.org/professionals/physician\\_gls/pdf/pain.pdf](https://www.nccn.org/professionals/physician_gls/pdf/pain.pdf)
6. Manchikanti L, Kaye AM, Knezevic NN, et al. Comprehensive, evidence-based, consensus guidelines for prescription of opioids for chronic non-cancer pain from the American Society of Interventional Pain Physicians (ASIPP). *Pain Physician*. 2023 Dec;26(7S):S7–S126. PMID: 38117465
7. Deer TR, Smith HS, Cousins M, et al. Consensus guidelines for the selection and implantation of patients with noncancer pain for intrathecal drug delivery. *Pain Physician*. 2010 May–Jun;13(3):E175–213
8. Hayek SM, Deer TR, Pope JE, et al. Intrathecal therapy for cancer and non-cancer pain. *Pain Physician*. 2011 May–Jun;14(3):219–48. PMID: 21587327
9. Carvajal G, Dupoirion D, Seegers V, et al. Intrathecal drug delivery systems for refractory pancreatic cancer pain: Observational follow-up study over an 11-year period in a comprehensive cancer center. *Anesth Analg*. 2018 Jun;126(6):2038–2046. doi:10.1213/ANE.0000000000002903

10. Aman MM, Mahmoud A, Deer T, et al. The American Society of Pain and Neuroscience (ASPN) best practices and guidelines for the interventional management of cancer-associated pain. J Pain Res. 2021 Jul 16;14:2139-2164. doi:10.2147/JPR.S315585

# Policy Revision History/Information

| Original Date: September 14, 2023 |            |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
|-----------------------------------|------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Review History                    |            |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
| Version 2                         | 03/29/2024 | Policy criteria reviewed and updated per medical literature                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               |
| Version 3                         | 07/10/2025 | <p>Annual review.</p> <p>Clarified the indications to improve usability and organization.</p> <p>Reworded the indications for “anti-spasmodic drugs”.</p> <p>Added an indication for “opioid and non-opioid drugs” for conservative care for non-malignant pain, (“physical therapy, interventional pain injections if medically appropriate, and medication including systemic opioids”).</p> <p>Added an indication for “opioid and non-opioid drugs” for “evaluation with a multidisciplinary physician team,” including a “psychological evaluation by a licensed mental health professional” and when “surgery is not indicated.”</p> <p>Included a note regarding covered devices (device-pump/battery, programmer, catheter, and extensions).</p> <p>Literature review – Medical Evidence section updated (Aman et al., 2021).</p> |