

## Lesson 16: Core GI and Systemic Modulators in Oncology

**Focus on Rasa Pachak, Rakta Pachak, Mansa Pachak, Medo Pachak and Asthi-Majja Pachak Vati**

### 1. Why Pachak Vati Is Central In Cytoveda Oncology

In Cytoveda's oncology model, treatment does not start from "anti-cancer drugs"; it starts from correcting the **terrain**:

- Jatharāgni and all subtypes of Agni
- Grahaṇi and Annavaḥa-Puriṣavaha srotas
- Dhātu-level metabolism (dhātu-pāka)
- Ama accumulation and Vāta-Pitta-Kapha imbalance at deeper levels

If digestion, assimilation and dhātu metabolism are disturbed, then:

- Classical medicines are poorly tolerated
- Chemo/RT side effects worsen
- Rasayana cannot work properly
- Cachexia and fatigue progress faster

Cytoveda's response to this is a very structured **Pachak Vati system**:

- Five specific Pachak Vatis
  - Rasa Pachak Vati
  - Rakta Pachak Vati
  - Mansa Pachak Vati
  - Medo Pachak Vati
  - Asthi-Majja Pachak Vati

Each is a **dhātu-focused GI and systemic modulator**, not just a digestive pill.

### 2. Pharmaceutical Concept - How Cytoveda's Pachak Vatis Are Made

All five Pachak Vatis share a common manufacturing philosophy:

1. **Classical base**
  - Each Vati is made from a classical kwath formulation described in **Caraka Saṃhitā and Aṣṭāṅgahṛdaya, Jvara Cikitsā Adhyāya**.
  - The core therapeutic logic is therefore 100% classical.
2. **Yavakut churna and decoction**
  - Coarse powder (Yavakut) of the kwath ingredients is prepared.
  - A decoction (kwath) of the same ingredients is made according to classical rules.
3. **Seven times trituration (7-bhāvanā process)**
  - The Yavakut churna is triturated **seven times** in the same kwath's decoction.
  - Each cycle allows deeper impregnation of the water-soluble active principles into the powder mass.
4. **Conversion to Vati form**
  - The well-processed mass is dried and rolled/compressed into tablets (Vati).

Clinical implications of this 7-fold trituration:

- Higher concentration of active principles than simple churna or single-decoction tablets
- Better homogenisation → more consistent effect from tablet to tablet
- Likely improved bioavailability and potency at lower doses
- Stronger dhātu-level action with relatively small tablet size

Thus, Pachak Vatis are **classically rooted, pharmaceutically optimised dhātu-Agni modulators** for oncology.

### 3. Overview Of The Five Pachak Vatis

Each Pachak Vati targets a predominant dhātu-layer, while also working on Agni, Ama and srotas:

1. **Rasa Pachak Vati** – Rasa dhātu, Rasa–Rakta interface, early systemic malaise
2. **Rakta Pachak Vati** – Rakta dhātu, inflammatory and toxic heat states
3. **Mansa Pachak Vati** – Māṃsa dhātu, local tissue overgrowth and infiltration pattern
4. **Medo Pachak Vati** – Meda dhātu, metabolic and adipose terrain, obesity, insulin resistance
5. **Asthi-Majja Pachak Vati** – Asthi and Majja dhātu, bone–marrow axis, deep depletion and pain

Selection is based on:

- Cancer site and behaviour
- Stage and burden of disease
- Performance status (ECOG)
- Laboratory parameters
- Agni status and GIT symptoms

Now, each one in detail.

### 4. Rasa Pachak Vati

#### 4.1 Primary Sphere

- **Dhātu focus:** Rasa (and early Rasa–Rakta interface)
- **Srotas:** Rasavaha srotas, Annavaha srotas

#### 4.2 Core Actions (Conceptual)

- Normalises early Rasa-dhātu formation from āhāra-rasa
- Supports jatharāgni in a relatively gentle way
- Reduces subtle Ama that presents as heaviness, low-grade feverishness, fatigue, coated tongue
- Enhances hydration and micro-circulation through clearer Rasa flow

#### 4.3 Typical Oncology Indications

- Early-stage or newly diagnosed patients with:
  - Loss of appetite, nausea, vague malaise
  - Mild swelling, heaviness, but not severe local tumour load yet
  - **Cancers where Rasa Dhātu is involved**
- Patients post-chemo or RT with:
  - Generalised fatigue
  - Poor appetite, tastelessness
  - Mild Rasa-level Ama without gross Grahaṇi pathology
- Patients where strong Deepana may aggravate Pitta or mucositis

#### 4.4 Clinical Profile

Think of Rasa Pachak Vati when the patient's complaints are "all over the body" but still subtle:

- "Doctor, I just feel heavy, tired, no appetite, mild body ache and low-grade feeling of fever."
- Tongue: mildly coated, moist
- Pulse: Kapha–Pitta or mixed

Rasa Pachak Vati lays the foundation by **cleaning and balancing the first dhātu**, making later higher-intensity therapies more tolerable.

## 4.5 Cautions

- In very advanced cachectic patients: start at minimal dose and only if Agni allows.
- In severe hypoalbuminemia or fluid overload states, dosing and frequency must be carefully titrated and labs monitored.

## 5. Rakta Pachak Vati

### 5.1 Primary Sphere

- **Dhātu focus:** Rakta
- **Srotas:** Raktavaha, Rasavaha

### 5.2 Core Actions (Conceptual)

- Acts on **Rakta-dushti and inflammatory heat** at the blood level
- Helps pacify burning, redness, constant low-grade fever, restlessness due to "hot" Ama
- Supports balanced haemopoiesis when used judiciously
- Can complement Jvaraghna, Shothahara and Rakta-śodhana formulations

### 5.3 Typical Oncology Indications

- Patients with significant **inflammatory and Rakta-dushti picture**:
  - Burning, flushing, heat intolerance
  - Frequent low-grade or recurrent fever
  - Erythema, skin rashes, post-RT erythema type
  - **Cancers where Rakta Dhātu is involved**
- Certain haematological and solid malignancies with strong Rakta-predominant symptomatology (always alongside standard care)
- Post-chemo or RT phases where inflammatory markers and subjective heat symptoms remain high

### 5.4 Clinical Profile

Think of Rakta Pachak Vati when:

- Patient repeatedly reports: "I feel burning inside", "heat rises in body", "face becomes red and hot," with irritability.
- Labs show inflammatory trends, though decision to use always integrates allopathic assessment.
- Tongue: reddish, maybe dry, with Ama coating in the background.

### 5.5 Cautions

- Not for uncontrolled bleeding, severe thrombocytopenia or active haemorrhage without oncologist approval.
- Dose and combination with other Pitta-altering medicines must be carefully planned.
- In severe liver dysfunction, proceed with caution and monitor LFTs.

## 6. Mansa Pachak Vati

### 6.1 Primary Sphere

- **Dhātu focus:** Māṃsa
- **Srotas:** Māṃsavaha, Medovaha (secondary), Rasavaha

### 6.2 Core Actions (Conceptual)

- Normalises **Māṃsa-dhātu pāka**
- Acts on localised tissue overgrowth, infiltration and nodularity from an Ayurvedic standpoint
- Helps correct Māṃsa-Meda stagnation and gross heaviness
- Can assist in post-operative tissue healing when timed and combined properly

### 6.3 Typical Oncology Indications

- Solid tumours with obvious **Māmsa-dhātu predominance** (breast, many soft-tissue masses, some head & neck cancers)
- Patients with:
  - Localised heaviness, stiffness and “mass” feeling
  - Surrounding muscle tightness, myalgia
- Post-surgical states where residual fascial tightness and pathological scarring tendencies are present (after proper wound healing and surgeon clearance)
- **Cancers where Mans Dhātu is involved**

### 6.4 Clinical Profile

Think of Mansa Pachak Vati when:

- Examination shows prominent bulky tissues, muscular heaviness around tumour site.
- The overall picture is of Kapha-Māmsa-Meda dominance: big body frame, heavy limbs, tendency to nodular swellings.

### 6.5 Cautions

- In extremely advanced tumours with ulceration, heavy necrosis or open wounds, avoid or use only in carefully chosen combinations and timings.
- Do not overshoot with Lekhana/Deepana in very thin, depleted patients; they may need more Rasa/Rakta/Asthi-Majja support instead.

## 7. Medo Pachak Vati

### 7.1 Primary Sphere

- **Dhātu focus:** Meda
- **Srotas:** Medovaha, Rasavaha, Māmsavaha

### 7.2 Core Actions (Conceptual)

- Regulates **Meda-dhātu formation and distribution**
- Works on obesity, central adiposity, metabolic syndrome patterns
- Supports correction of **Kapha-Meda-Ama** milieu that frequently accompanies hormonally driven and lifestyle-associated cancers
- Synergises with Guggulu and Lekhaniya group formulations in metabolic oncology

### 7.3 Typical Oncology Indications

- Overweight or obese patients with:
  - Breast, endometrial, ovarian, colorectal and some prostate cancers
  - Associated conditions like insulin resistance, pre-diabetes, dyslipidemia
- Survivorship patients where long-term recurrence risk is linked to obesity and metabolic syndrome
- Cases where hormonotherapy (like tamoxifen, aromatase inhibitors, steroids) contributes to weight gain and Metabolic disturbances
- **Cancers where Meda Dhātu is involved**

### 7.4 Clinical Profile

Think of Medo Pachak Vati when:

- Patient has **clear Meda-prakopa**: truncal obesity, fatty liver tendency, high triglycerides, sluggishness, excessive sweating, heaviness.
- Cancer is strongly associated with metabolic risk (e.g., post-menopausal breast cancer with obesity, NAFLD, PCOS

background).

## 7.5 Cautions

- Very weakened, advanced cancer patients who have lost much weight are usually **not candidates** for Medo Pachak emphasis; they need Brimhana-Rasayana rather than Lekhana.
- Requires regular monitoring of blood sugar, lipids and liver function when combined with systemic oncology treatment.

## 8. Asthi-Majja Pachak Vati

### 8.1 Primary Sphere

- **Dhātu focus:** Asthi and Majja
- **Srotas:** Asthivaha, Majjavaha, Rasavaha

### 8.2 Core Actions (Conceptual)

- Supports correct **Asthi-Majja dhātu-pāka**
- Addresses deep depletion of bone and marrow from an Ayurvedic angle
- Helps in chronic pain, bone aches, marrow weakness, neuropathy patterns (in combination with other Vāta-vyādhi medicines)
- May support better tolerance of myelosuppressive therapies when used judiciously (always as an adjunct, never as a replacement for standard oncologic care)

### 8.3 Typical Oncology Indications

- Cancers with bone and marrow involvement:
  - Bone metastases
  - Multiple myeloma and certain leukemias/lymphomas (always under strict integrative protocol)
- Patients with:
  - Deep bone pain, back pain, rib pain
  - Frequent infections, anaemia, thrombocytopenia (along with allopathic management)
- Long-term survivorship after intense chemo/RT with evidence of osteopenia, osteoporosis or chronic marrow fatigue
- **Cancers where Asthi or Majja Dhātu is involved**

### 8.4 Clinical Profile

Think of Asthi-Majja Pachak Vati when:

- Patient describes “pain in the bones,” cracking, fragility, deep tiredness not explained by simple Rasa-Rakta issues alone.
- Long history of steroids, chemo, RT to spine/pelvis, or high-risk for osteoporosis.

### 8.5 Cautions

- Always coordinate with oncologist/physician when severe marrow suppression, very low counts or pathologic fractures are present.
- Do not rely on this Vati alone for bone or marrow disease; it is supportive, not curative.
- Adjust or pause around periods of invasive procedures or high-dose myelosuppressive therapy as per safety protocols.

## 9. How The Five Pachak Vatis Fit With Other GI Modulators

The five Pachak Vatis form the **core, dhātu-directed axis**. Around them, Cyoveda uses:

- Deepana-Pācana Vatis and Churnas
  - Agnitundi Vati, Chitrakadi Vati, Sanjivani Vati, Tribhuvankirti Ras

- Hingwashtak, Lavan Bhaskar, Shivakshar, Panchasakar etc.
- Grahanī and Koṣṭha stabilisers
  - Kutajghan Vati, Gangadhar Ras, Bilwadi Churna
  - Avipattikar Vati/Churna, Triphala Vati/Churna
  - Belgiri and Udumbar Ghansatva Tablets

These are chosen:

- To balance **jatharagni**
- To **support** the main Pachak Vati (e.g., Medo Pachak + Chitrakadi in a Meda-predominant patient)
- Or as **temporary stand-alone tools** when specific acute GI issues dominate (e.g., Kutajghan in acute atisāra, Triphala in opioid constipation)

The rule is:

- One primary Pachak Vati as dhātu axis
- 1-2 supportive Deepana/Grahanī medicines as per symptom pattern
- Always aligned with ECOG status, stage, and chemo/RT schedule

## 10. Key Take-Home Points

1. Cytoveda's five Pachak Vatis (Rasa, Rakta, Mansa, Medo, Asthi-Majja) are derived from classical kwath formulas and processed through seven-fold trituration in their own decoction, making them potent dhātu-level GI and systemic modulators.
2. Rasa Pachak Vati focuses on early systemic malaise, subtle Ama and foundational Rasa balance; it is often the first choice in early or post-therapy fatigue states.
3. Rakta Pachak Vati targets Rakta-dushti and inflammatory heat, suitable in burning, low-grade feverish, Rakta-predominant patterns under proper monitoring.
4. Mansa Pachak Vati is considered in solid, bulkier, Māṃsa-dominant tumours and local heaviness, while Medo Pachak Vati is central for metabolic-Meda-dominant terrain (obesity, metabolic syndrome-linked cancers).
5. Asthi-Majja Pachak Vati supports bone-marrow axis and deep depletion, especially in bone metastasis, marrow involvement and post-chemo/RT osteopenic states, always as an adjunct.
6. These five Vatis are integrated with other Deepana-Pācana and Grahanī-Koṣṭha formulations in a personalised manner, guided by cancer type, stage, performance status and organ functions.

## 11. Review Questions

1. Explain the unique pharmaceutical process used for Cytoveda's Pachak Vatis and why this may provide clinical advantages in oncology.
2. Describe three clinical situations in which Rasa Pachak Vati would be preferred over Rakta Pachak Vati.
3. How would you differentiate, at the bedside, when to emphasise Mansa Pachak Vati versus Medo Pachak Vati in a solid tumour patient?
4. Outline an integrative plan using Asthi-Majja Pachak Vati in a patient with bone metastases and chronic bone pain, highlighting what allopathic monitoring is essential.
5. For a post-menopausal obese woman with hormone-positive breast cancer on adjuvant hormonotherapy, which Pachak Vati would you prioritise and why? How would you combine it with other GI modulators safely?