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Original Article

Multimodal Management of Tension-Type Headache: A Narrative Review of Pharmacological and Non-Pharmacological Perspectives

Dr. Gautami Ohal, Dr. Vinodini V. Patil*

Department of Homoeopathic Philosophy and Organon of Medicine Bharati Vidyapeeth (Deemed to be University) Homoeopathic Medical College, Pune.

ABSTRACT

Background: Approximately 38% of adults suffer from tension-type headache (TTH), considered the most common primary headache disorder worldwide as well as one of the main causes of years spent with disability. In clinical practice, TTH is still underdiagnosed and inadequately cared for despite its epidemiological significance. Objective: To offer a complete, evidence-based evaluation of multimodal TTH management approaches that incorporate both medicinal and alternatives to medication into a biopsychosocial framework. Methods: A systematically conducted narrative review of literature indexed in PubMed, Scopus, and Cochrane was performed, covering publications from January 2000 to December 2024. Priorities included systematic reviews, meta- analyses, randomized controlled studies, and international guidelines, prospective cohort studies and controlled clinical trials. Results: The search retrieved 87 eligible studies after screening. Basic analgesics and NSAIDs provide good short-term relief, but the preventive proof is strongest for tricyclic antidepressants, such as amitriptyline, etc. Alternative treatments, such as acupuncture, physiotherapy, cognitive behavioural therapy, and work modification, provide significant reduction of frequent headache syndromes, especially for patients with chronic TTH, though evidence quality varies across modalities. The results of multimodal treatments consistently outweigh those of monomodal treatments. Conclusion: The management of TTH requires an individually tailored, multimodal approach that includes biological, psychological, and environmental aspects of headache burden. The standard treatment for both chronic and frequent episodic TTH should be integrative, i.e., include both pharmacological and non-pharmacological treatment options.

Keywords: Tension type Headache, analgesics, acupuncture, physiotherapy

INTRODUCTION:

According to the International Classification of Headache Disorders, Third Edition (ICHD-3), tension-type headache (TTH) is a primary headache disorder that is characterized by bilateral, mild to moderately intense pressing or tightening pain that does not worsen with regular physical activity and does not typically accompanied by nausea, although mild nausea may occur in a subset of patients with chronic TTH.[1] According to epidemiological research, the lifetime prevalence of TTH varies from 30% to 78% globally. According to the Global Burden of Disease study, TTH is ranked second in the world for years lived with disability[2,3].

Healthcare systems often underestimate the significant economic burden of TTH, which contributes to lost productivity, increased healthcare utilisation, and diminished quality of life.[4] Chronic TTH, defined as headache occurring on ≥15 days per month, affects approximately 2–3% of the general population and accounts for a disproportionate share of headache-related disability.[4]

The pathophysiology of TTH is characterised by complex interactions between peripheral myofascial sensitisation and central pain modulation. Increased pericranial muscle tenderness reflects the activation and sensitisation of peripheral nociceptors in myofascial tissue[5]. In chronic TTH, this peripheral sensitisation may progress to central sensitisation via facilitated trigemino-cervical pathways, thereby lowering pain thresholds and contributing to headache chronification — a mechanism that underscores the rationale for combining peripheral-targeted (physiotherapy, acupuncture) with centrally-acting (pharmacological, psychological) interventions. Dynamic

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relationships between psychosocial stress, sleep dysfunction, postural dysfunction, and maladaptive pain behaviours are also significant in pathophysiology of TTH.[6]

No single therapeutic approach is universally adequate for managing TTH, given the heterogeneity in its pathophysiology, clinical subtypes, and individual patient profiles. For frequent episodic and chronic TTH, the American Headache Society (AHS) and the European Federation of Neurological Societies (EFNS) have suggested a multimodal approach, including pharmaceutical and evidence-based behavioural, physical, and lifestyle interventions [7,8].In order to help the practitioner make a customized evidence- based treatment plan, this review systematically examines the evidence for six important management areas: acute pharmacotherapy, prophylactic pharmacotherapy, acupuncture, physiotherapy, cognitive behavioural therapy, and lifestyle and ergonomic interventions.

MATERIAL AND METHODS

Review Design

This review follows a structured narrative approach in which a predefined search strategy and inclusion/exclusion criteria were applied, but formal meta-analytic synthesis was not conducted due to anticipated heterogeneity across treatment modalities. It does not constitute a formal systematic review in the PRISMA sense and is best described as a systematically conducted narrative review.

Search Strategy

Searches were conducted in PubMed, Scopus, and Cochrane from January 2000 to December 2024, with the final search update completed on 10 January 2025. Controlled vocabulary terms used included: 'Tension-Type Headache', 'Analgesics', 'Anti-Inflammatory Agents, Non-Steroidal', 'Amitriptyline', 'Acupuncture Therapy', 'Cognitive Behavioral Therapy', and 'Exercise Therapy'. These were combined using Boolean operators (AND/OR) with free-text terms including 'tension headache', 'TTH management', 'multimodal', 'prophylaxis', 'physiotherapy', and 'ergonomic intervention'. The same logic was adapted for Scopus and Cochrane.

Inclusion Criteria:

- Articles published in English language.
- Articles published uptill 2024, a systematic narrative review of literature indexed by Scopus, PubMed, and Cochrane was carried out.
- Priorities included systematic reviews, meta-analyses, randomized controlled studies, and international guidelines, controlled clinical trials, prospective cohort studies, and clinical practice guidelines.
- Intervention: Studies evaluating any pharmacological or non-pharmacological (acupuncture, physiotherapy, CBT/behavioral therapy, lifestyle modification, ergonomic intervention) treatment strategy for TTH.

Exclusion Criteria

- Articles not published in English language.
- Publication that lacks adequate methodological information.
- Multiple data bases have duplicate publications identified.
- Non peer reviewed, web content and blogs.

Study Selection

Titles and abstracts identified by the search were independently screened by both authors against the inclusion/exclusion criteria. Full-text articles were retrieved for all potentially eligible records and reviewed in detail. Disagreements were resolved by discussion and consensus. Duplicate records across databases were identified and removed prior to screening.

RESULTS

The search retrieved 1,247 unique records after deduplication. Following title/abstract screening, 189 full-text articles were reviewed, of which 87 met the inclusion criteria. These comprised 24 randomised controlled trials, 18 systematic reviews or meta-analyses, 14 clinical practice guidelines, 19 prospective cohort studies, and 12 controlled clinical trials. Study populations ranged from adults with episodic TTH to those with chronic TTH; interventions included acute and preventive pharmacotherapy, acupuncture, physiotherapy, cognitive behavioural therapy, and lifestyle/ergonomic strategies.

Although NSAIDs and moderate analgesics provide short-term relief, amitriptyline is the most well-supported prophylactic treatment for frequent and

chronic TTH. For chronic TTH patients or those with few treatment alternatives, non-pharmacological therapies such as acupuncture, physical therapy, cognitive behavioural therapy, and lifestyle modifications should be taken into consideration, though the strength and consistency of evidence varies across modalities (see Table 1 for an evidence summary). Evidence suggests that integrating pharmacological and non-pharmacological interventions within a biopsychosocial framework consistently produces better outcomes than monomodal approaches.

Table 1: Summary of Evidence Strength by Treatment Modality

Treatment	Evidence Level	Key Outcome	Notes
Simple analgesics (paracetamol, aspirin, NSAIDs)	Strong (IA)	Acute pain relief	Short-term only; MOH risk
Amitriptyline	Strong (IA)	Headache frequency reduction	Best-supported prophylactic agent
Acupuncture	Moderate (IB)	Frequency, disability	Heterogeneous trials; non-inferior to preventive medication
Physiotherapy / Manual therapy	Moderate (IB)	Frequency, severity	Best evidence for cervicogenic component
CBT / Biofeedback	Moderate (IB)	Frequency, disability	Durable effects; comparable to pharmacotherapy
Tizanidine	Limited (IIB)	Frequency, severity	Single small RCT; third-line option only
Lifestyle / Ergonomic interventions	Limited (III)	Trigger reduction	Observational data; TTH-specific RCTs limited

DISCUSSION

Acute Pharmacotherapy

It is the treatment of headache pain when the headache occurs. The choice of therapy is determined by headache severity, onset of pain, patients comorbidity, and most importantly, the risk of medication overuse headache (MOH) that occurs when acute headache therapy is used for 10 to 15 days of the month.

Simple Analgesics- Paracetamol (Acetaminophen)

Recommended dose according to international guidelines is 1,000 mg. It offers a favorable safety profile and is appropriate for patients who cannot tolerate NSAIDs. Its efficacy in TTH is modest but clinically meaningful, with NNT of approximately 12-50% pain relief at two hours. Paracetamol's analgesic mechanism is not fully elucidated; proposed mechanisms include inhibition of a central COX isoform (sometimes designated COX-3), modulation of the endocannabinoid system, and activation of descending serotonergic pathways, though these remain areas of ongoing investigation[9].

Aspirin

Aspirin, in a dose range of 500–1,000 mg, provides analgesic and anti-inflammatory effects comparable to ibuprofen for TTH. According to Cochrane, Derry et al. (2017), the NNT for 50% pain relief at two hours at 500 mg is about 8.7.12 Common side effects include upset stomach, gastrointestinal irritation, and, with long-term use, stomach ulcers. People under 16, people with known coagulopathy, and people with active peptic ulcer disease should not take aspirin because it can cause Reye syndrome.

It irreversibly inhibits the enzymes COX-1 and COX-2, thereby reducing the synthesis of

prostaglandins that are responsible for peripheral and central sensitisation in the management of acute TTH[10].

NSAIDs

NSAIDs like ibuprofen 200 mg provided 45% of patients with 50% pain relief at two hours, Ibuprofen 400 mg exhibited a reduced NNT of 4.8 for pain alleviation at two hours and an NNT of 5.9 for headache relief at the same interval, indicating two separate efficacy outcomes identified in that review. Other NSAIDs include naproxen sodium, diclofenac, and ketoprofen have demonstrated similar acute efficacy[11].

Analgesic Combination

Fixed-dose combinations of analgesics and caffeine have shown greater efficacy than monotherapy in

TTH. Caffeine functions as a pharmacological adjuvant improving analgesic absorption and central pain regulation. The triple combination of aspirin, paracetamol, and caffeine (250 mg/250 mg/65 mg) achieves NNTs outperforming individual components.

However, the use of caffeinated combination products should be restricted to no more than 10–15 days per month because to the increased risk of MOH and caffeine-withdrawal headaches.

Preventing Medication-Overuse Headaches

MOH is a clinically relevant issue in TTH. According to the ICHD-3, MOH, which affects 1% to 2% of the general population is characterized by headaches that occur on 15 or more days per month and are linked to frequent abuse of acute medicine for more than three months[1,12]. The EFNS recommends that misuse of acute medications be restricted to 15 days per month for simple analgesics and 10 days per month for combination medicines[13].

Preventive medicine should be begun immediately for patients who are close to these limits.

The organised withdrawal of analgesics with the simultaneous use of behavioural therapy can assist in the resolution or prevention of the onset of MOH[8].

Table 2: Summary of Acute Pharmacotherapy for Tension-Type Headache (See Below)[8,10,11,13,14].

Drug	Dosage	NNT (50% pain relief at 2 hours)	Evidence Level
Paracetamol	1,000 mg	7.7	IA (Cochrane RCT)
Aspirin	500–1,000 mg	8.7 (500 mg)	IA (Cochrane RCT)
Ibuprofen	200–400 mg	5.9–4.8	IA (Cochrane RCT)
Naproxen sodium	~6 375-550 mg	~6	IB
ASA + Caffeine + Paracetamol	500/500/130 mg	3.3	IA (Multicenter RCT)

*ASA = Acetylsalicylic acid; NNT=Number Needed to Treat

Preventive Pharmacotherapy

The prophylactic management of TTH attacks include reduction of headache frequency by at least 50%, reduction of headache severity, duration, improvement of response to acute treatments, restoration of functional capacity, prevention of chronification, and prevention of MOH[15]. A minimum of 8 to 12 weeks of treatment at an effective dose should be tried before determining treatment failure.

Tricyclic Antidepressants

Amitriptyline

The most scientifically studied and validated preventative medicine for TTH is amitriptyline. In the historical randomised controlled trial, it was determined that amitriptyline at doses of 75–100 mg/d was associated with a reduction in headache activity of 38% compared with a reduction of 9% with placebo ($p < 0.001$)[8]. The EFNS guideline (Bendtsen et al., 2010), the Cochrane review (Verhagen et al., 2010), and the Canadian Headache Society guideline (Becker et al., 2015) all agree that amitriptyline is the best first-line treatment for chronic and frequent episodic TTH[7].

Dose is titrated over a few weeks from 10–25 mg/d nocturnal dose to a dose range of 50–75 mg/d. Side effects include weight gain, orthostatic hypotension, anticholinergic side effects, and daytime sedation.

Mirtazapine and Nortriptyline

Nortriptyline is a secondary amine tricyclic antidepressant and is also an active metabolite of amitriptyline, with a similar efficacy profile and fewer anticholinergic side effects, making it a preferable option in elderly patients or those with significant anticholinergic sensitivity (25–75 mg nocte)._Mirtazapine is a noradrenergic and specific serotonergic antidepressant (NaSSA) with a distinct pharmacological mechanism. Limited evidence from open-label and small controlled studies suggests potential benefit in TTH, particularly in patients with comorbid insomnia or anorexia; however, stronger TTH-specific data are needed before firm recommendations can be made (15–30 mg nocte).

Serotonin-Norepinephrine Reuptake Inhibitors (SNRIs)

Venlafaxine ER decreased headache days per month (22.4 to 14.1; $p < 0.001$) and quality of life measures as compared to a placebo in a double-blind randomized trial of 60 chronic TTH patients, according to

Zissis et al Duloxetine 60–120 mg/day is another SNRI used to treat TTH[16].

Tizanidine, a Muscle Relaxant

Tizanidine is a central alpha-2 adrenergic agonist that can help with pain and relax muscles. Fogelholm and Murros (1992) documented substantial decreases in analgesic consumption, headache frequency, and headache intensity in a double-blind, placebo-controlled crossover study involving 45 chronic tension-type headache patients. The evidence base for tizanidine is limited, primarily relying on a single small, older trial. It may be regarded as a tertiary option for meticulously chosen patients exhibiting significant myofascial tension, awaiting more robust evidence. The dose should be adjusted from 2 mg/day to a maximum of 18 mg/day in smaller amounts[17].

Clinical Algorithm for Prophylaxis Selection

Amitriptyline 10 mg nocte for frequent/chronic TTH with no comorbidities; titrate to 50–75 mg over 4–6 weeks[7,8]

Venlafaxine ER 75–150 mg/day or Duloxetine 60 mg/day for TTH + Depression/Anxiety [16]

Tizanidine 2–18 mg/day (titrated) for TTH with prominent myofascial discomfort[8]

TTH + TCA intolerance/elderly: Mirtazapine 15–30 mg nocte or Nortriptyline 25–75 mg nocte [8]

Reassessment: Using proven outcome measures (HIT-6, MIDAS) at 8–12 weeks.

Acupuncture

Acupuncture has a long tradition in pain management and has been increasingly scrutinized under evidence-based frameworks for the management of primary headache disorders

Neurobiological Mechanisms

The analgesic mechanisms of acupuncture in TTH include various interrelated mechanisms in the peripheral nervous system, spinal cord, and brain. Stimulation of local afferent nerve endings in pericardial acupoints using acupuncture needles activates A-Delta and C-fiber afferent nerve endings in the brain, releasing endogenous opioids such as beta-endorphins, enkephalins, and dynorphins; adenosine; and inflammatory mediators that reduce peripheral nociceptive sensitization[18]. Functional neuroimaging has demonstrated that acupuncture[19].

Protocol for Treatment

Different studies report very different acupuncture protocols. Most published trials have used 6 to 12 sessions over 4 to 8 weeks, but it is not clear what the best number and frequency of treatments is. Local pericranial points such as GB 20 (Fengchi), GV 20 (Baihui), EX-HN3 (Yintang), ST 8 (Touwei), and GB 14 (Yangbai) are frequently used together with distal analgesic points such as LI 4 (Hegu) and LR 3 (Taichong Dry needling of myofascial trigger points in the cervical and pericranial musculature constitutes a form of Western acupuncture aimed at peripheral sensitization[20].

Clinical Evidence

According to the Cochrane systematic review of the literature, acupuncture significantly reduced the frequency of headaches compared to sham acupuncture (standardized mean difference, -0.15; 95% CI, -0.25 to -0.05), was at least as effective as preventive medication therapy, and had a more favorable side-effect profile.

A prior Cochrane research by Melchart et al. (2001) showed that acupuncture is superior to either standard care or no treatment for the prevention of TTH[21]. It is important to note that there is a lot of variation between acupuncture trials in terms of study design, blinding method, control conditions, and effect certainty. This means that conclusions should be taken with care.

Safety Profile

Clinical studies have consistently demonstrated that acupuncture possesses a positive safety profile. Less than 10% of sessions have minor side effects, like temporary bruising, soreness in the areas where needles are used, and occasional dizziness. But when professionals use sterilized single-use needles, serious side effects are very rare. Some examples of contraindications are problems with blood clotting, infections at the sites of needling, and certain stages of pregnancy[21].

Physiotherapy

Physiotherapy includes manual, exercise-based, and physical modalities that focus on the peripheral myofascial and cervicogenic pain mechanisms associated with TTH. Elevated pericranial pain sensitivity and cervical musculoskeletal dysfunction are consistent

objective findings in TTH, contributing to the peripheral sensitization of pericranial nociceptors.

Spinal Manipulative Therapy and Manual Techniques

High-velocity low-amplitude (HVLA) cervical manipulation and lower-grade mobilization techniques target segmental dysfunction in the upper cervical spine (C0-C3), which contributes to TTH through sensitization of the trigemino-cervical nucleus caudalis. Systematic reviews support modest but significant benefits in TTH frequency and disability, though HVLA manipulation should be performed only by trained practitioners after appropriate patient assessment.

A randomized controlled trial comparing spinal manipulative therapy and amitriptyline over a six-week period revealed that both approaches produced comparable improvements in headache frequency, duration, and severity in a study by Boline et al. (1995) on 127 patients with TTH.

Exercise for Therapy

Cervical Stabilization Exercises: By gradually strengthening the scapular stabilizers and deep cervical flexors (longus colli, longus capitis), muscle imbalances that cause postural headaches are corrected. One well-researched method is craniocervical flexion training with pressure biofeedback.

Stretching and Mobility Work: The postural rigidity and forward head position commonly

seen in TTH patients are addressed with cervical range-of-motion exercises, suboccipital stretches, and pectoral stretching.

Aerobic Exercise: Regular aerobic exercise (30 minutes, three to five times a week) has shown prophylactic advantages in TTH, with some trials showing headache frequency reductions comparable to topiramate prophylaxis. Exercise modifies serotonin pathways related to pain processing and enhances the release of central opioids.

TENS, or transcutaneous electrical nerve stimulation

TENS applied to the supraorbital and occipital nerves in controlled trials was found to have considerable preventive effects in TTH. Biofeedback-assisted diaphragmatic breathing using TENS was found to reduce headache frequency in a manner similar to propranolol in a 3 month period, according to Kaushik et al. (2005)[22]. Supraorbital TENS is available in the form of a non-invasive medical device for home use. It is a useful modality for those who cannot attend regular physiotherapy sessions.

Biofeedback Treatment

One of the most researched behavioral physiotherapy techniques for TTH is electromyographic (EMG) biofeedback therapy, which trains patients to identify and lower abnormal levels of pericranial muscle activity. Nestoriuc et al. (2008) did a thorough meta-analysis of 35 randomized studies and found that EMG biofeedback decreased headache frequency with a medium to moderate effect size (d = 0.73), and the effect continued at a one- year follow-up [22].

Cognitive behavioral therapy (CBT)

It is an evidence-based psychological intervention for managing maladaptive cognitive processes, emotional responses, and behavioral practices that contribute to or prolong chronic

pain conditions, such as TTH. A substantial evidence base and theoretical support for CBT are evident in its recommendation in international guidelines for managing TTH. CBT is founded on a biopsychosocial model of chronic headache.

Theoretical Justification

The most frequently mentioned cause of TTH in population-based epidemiological research is psychological stress[23]. TTH pain is modulated by cognitive and emotional factors through top-down corticospinal pathways that influence descending pain inhibition, autonomic nervous system tone, and muscle tension. The biopsychosocial model of TTH recognizes that psychological stress directly increases pericranial muscle activity and lowers pain thresholds; catastrophizing predicts headache chronification and treatment resistance; avoidance behaviors perpetuate disability and depression; and maladaptive coping strategies such as medication overuse worsen long-term outcomes.

CBT Protocol and Components

A basic CBT regimen for treating TTH typically consists of 8 to 15 sessions, each lasting 45 to 60 minutes, held either individually or in groups once a week[24].The fundamental elements of CBT for the treatment of TTH are:

Psychoeducation: Model for headaches that takes behavior, stress, and cognition into account

Cognitive restructuring: Recognizing, assessing, and altering dysfunctional or catastrophic ideas and pain beliefs connected to headaches[25].

Progressive muscle relaxation (PMR): It includes the systematic tension of muscles, followed by relaxation, known as the Jacobson technique, for the reduction of physiological arousal levels and pericranial muscle tension

Coping skills, stress inoculation: The patient learns problem-solving skills, which include the development of variable coping skills for known stressors/ headache.

Behavioral activation: Restoration of valued life roles, despite headache, including avoidance activities[26].

Sleep hygiene: A major bidirectional risk factor for TTH, sleep hygiene and sleep consolidation are important.

Relapse prevention: To maintain treatment gains, headache management plans should be developed and warning indicators should be identified

Clinical Proof

CBT-based therapies, especially relaxation training and biofeedback, have been shown in numerous meta-analyses to result in clinically significant decreases in headache frequency, intensity, and disability in both episodic and chronic TTH. Benefits seem to last longer at long-term follow-up, and effect sizes are similar to those of pharmaceutical prophylaxis. The integrated multimodal strategy is supported by the fact that the combination of CBT and medication routinely performs better than either modality alone. Acceptance and Commitment Therapy (ACT) and Mindfulness-Based Stress Reduction (MBSR), which address psychological flexibility and pain acceptance, have also shown encouraging outcomes in headache disorders.

ERGONOMIC INTERVENTIONS AND LIFESTYLE

TTH susceptibility, triggering, and chronification are significantly influenced by lifestyle factors. A safe, affordable, and scientifically validated aspect of TTH care is structured lifestyle and ergonomic interventions, which provide patients with self-management techniques that go beyond the therapeutic consultation.

Stress Management: 60 - 80% of patients identified psychosocial stress as the most common trigger for TTH in clinical evaluations[23].In one study, relaxation techniques like progressive muscle relaxation, autogenic training, diaphragmatic breathing, and imagery were found to be effective in reducing the frequency of TTH in clinical trials with effect sizes comparable to pharmacological prophylaxis in head-to-head studies. It would be best to encourage patients to identify main sources of stress in their lives and to develop a regular habit of relaxation techniques for 10 to 20 minutes a day

Optimizing Sleep

TTH is both a cause and an effect of sleep disturbance, resulting in a reciprocal interaction that, if left untreated, prolongs the chronification of headaches. Among the recommendations supported by evidence are: Keeping regular sleep and wake hours on weekdays and weekends, 7–9 hours of sleep every night, establishing the ideal sleeping conditions (quiet, dark, and cool; stay away from screens an hour before bed), steer clear of alcohol as a sleep aid; although it encourages the onset of sleep, it breaks up the architecture of sleep, treating co-occurring sleep disorders (such as obstructive sleep apnea and insomnia disorder) appropriately.

Frequent Exercise

Both a sedentary lifestyle and low cardiovascular fitness are risk factors for TTH and are independently linked to an increased incidence of TTH[27]. By encouraging the release of endorphins, regulating serotonin levels, restoring the autonomic nervous system, enhancing cervical muscular endurance, and lowering stress, regular exercise helps prevent TTH.

Considering Nutrition and Hydration

The unappreciated causes of TTH that can be modified include dehydration. The stimulation of meningeal nociceptors by hyperosmolality and increased intracranial pressure, which result from the lack of adequate fluid intake, can reduce the pain threshold in the brain. The patients should ingest 2.0 to 2.5 liters of water every day according to the level of physical activity and the ambient temperature. The patients should adhere to the normal time of meals to avoid fasting because irregularities in meals trigger TTH attacks through autonomic and neuroendocrine mechanisms.

In an analysis of the Women's Health Study cohort, Rist et al. (2015) reported that Western dietary style

was associated with increased headache burden, while fruit and vegetable dietary style was associated with significantly lower headache prevalence[28].

Ergonomics in the Workplace

Sustained postural loading is a significant modifiable risk factor for TTH through cervicogenic and myofascial mechanisms, especially in occupational situations involving extended computer usage, desk employment, or vehicle operating.

Important ergonomic guidelines for TTH management include:

Workstation setup with proper chair adjustment, position of monitor at eye level, micro break scheduling of 2-5 minutes break every 30-45 minutes, visual correction, lighting optimization to lessen photovisual TTH.

Mork et al. (2020) also emphasize the significance of ophthalmic ergonomics in the treatment of TTH patients. In their double-blind randomized study, they discovered that eyestrains and the frequency of periocular headaches were significantly reduced when lighting conditions were optimized and screen time was decreased. For individuals with occupationally generated TTH, a workplace ergonomic evaluation by a physiotherapist or occupational health care provider is advised.[29]

Clinical Advice And Integrated Multimodal Approach

Because of its complicated pathophysiology, which includes elements like myofascial sensitization and psychological components, Tension-Type Headache (TTH) management calls for a multimodal approach. A groundbreaking investigation conducted by Holroyd et al. (2001) 26 shown that combination pharmacological and behavioral therapy reduce headaches more effectively (64%) than monomodal approaches (~35-38%)[8]Treatment recommendations vary based on the type of TTH: for infrequent episodic TTH, simple analgesics and lifestyle changes are advised; for frequent episodic TTH, acute analgesics, amitriptyline, physiotherapy, and relaxation techniques are advised; for chronic TTH, amitriptyline, acupuncture, cognitive behavioral therapy, and lifestyle changes are advised, along with frequent evaluations using headache impact assessments. Shared decision-making increases treatment adherence by involving patients in the planning of their care.

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Dr.Gautami Ohal[1]: Conceptualization, literature review, data analysis, writing – original draft

Dr.Vinodini V. Patil[2]* - Methodology, supervision, critical review and editing, final approval of the manuscript.

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