



International Journal of Medical and All Body Health Research

Physiotherapy Management of Right-Sided Cervical Radiculopathy with Coexisting Trapezitis: A Case Report

Tanishk Tomar

People's University, Bhopal, Madhya Pradesh, India

* Corresponding Author: **Tanishk Tomar**

Article Info

ISSN (online): 2582-8940

Volume: 07

Issue: 03

Received: 21-06-2026

Accepted: 19-07-2026

Published: 17-08-2026

Page No: 251-257

Abstract

Background: Cervical radiculopathy commonly coexists with trapezitis, and the combination can complicate presentation, as the myofascial component may mask an underlying radicular process and delay structured rehabilitation.

Case Presentation: A 53-year-old male driver with a several-year history of intermittent mild right-arm numbness presented with acute worsening of right trapezius pain radiating to the right upper limb, aggravated by sneezing and accompanied by paraesthesia, without motor or sensory deficit. Initial medical management produced little relief, and imaging with specialist review refined the diagnosis to right C5–C6 radiculopathy with trapezitis. He was referred for structured physiotherapy.

Intervention: Physiotherapy followed a two-phase progressive model - acute pain modulation followed by progressive rehabilitation and functional integration - delivered over 3–4 weeks, combining electrotherapy, manual therapy, neural mobilisation, therapeutic exercise, trigger-point and dry-needling techniques, and driving-specific postural and ergonomic retraining.

Result: Pain reduced progressively from severe (NPRS 8/10) at baseline to minimal (1–2/10) at final review, with parallel improvement in Neck Disability Index score from 37/50 (severe) to 9/50 (mild), alongside gains in cervical range of motion, neural tension testing, trapezius tenderness, paraesthesia frequency, and driving tolerance.

Conclusion: This case illustrates how a longstanding, previously subclinical numbness culminating in acute-on-chronic worsening, combined with trapezitis overlap, can complicate early recognition, and how a structured, phase-based physiotherapy programme can achieve substantial functional recovery within a short treatment window.

DOI: <https://doi.org/10.54660/IJMBHR.2026.7.3.251-257>

Keywords: cervical radiculopathy, trapezitis, physiotherapy, rehabilitation, C5–C6, myofascial pain, case report

Introduction

Cervical radiculopathy results from compression or irritation of a cervical nerve root, most often due to disc herniation or spondylotic foraminal narrowing, producing pain, sensory change, weakness, or reflex loss in a nerve-root distribution. The upper trapezius is a frequent site of coexisting myofascial pain (trapezitis) in patients with cervical spine pathology, and the two conditions can present with overlapping regional pain, which may delay recognition of a true radicular component when trapezius pain dominates the initial picture.

Most cases follow a favourable natural history and respond within weeks to conservative management. A minority show early non-response to first-line measures and require a more structured, supervised rehabilitation programme. This report describes one such case, notable for a several-year subclinical prodrome culminating in an acute, treatment-resistant flare that responded

once a phase-based physiotherapy protocol was introduced, illustrating the diagnostic and management challenges posed by trapezitis-radiculopathy overlap and the contribution of structured physiotherapy to recovery.

Epidemiology

The only population-based incidence study of cervical radiculopathy, a records-linkage survey of 561 patients in Rochester, Minnesota, reported an average annual age-adjusted incidence of 83.2 per 100,000 population, with age-specific incidence peaking at 202.9 per 100,000 in the 50–54-year age group - the exact band this patient falls into. The C7 root was most frequently involved, followed by C6^[1]. This patient's diagnosis localised to C5–C6, somewhat less common than the C6/C7 predominance reported in that cohort.

Prevalence

Trapezitis and cervical radiculopathy commonly co-occur. Upper trapezius myofascial pain syndrome has been identified in 86% of overhead athletes presenting with neck and shoulder pain^[2], and in a cohort of patients diagnosed with cervical radiculopathy, 61.6% also met criteria for cervicogenic headache^[3] - supporting the pattern seen in this case, where a myofascial component and a true radicular component presented concurrently.

Uniqueness of Study

This case is notable for two reasons. First, a several-year history of mild, subclinical numbness culminated in an acute flare - an acute-on-chronic pattern rather than a new-onset radiculopathy. Second, the presenting complaint was dominated by trapezius-region pain and sneeze-provoked exacerbation rather than classical arm-dominant radicular pain, and the patient's occupation as a driver - a plausible mechanical contributor - allowed structured physiotherapy to directly target driving-specific ergonomics alongside standard rehabilitation, a combination infrequently documented explicitly in the literature.

Case Presentation

Patient X, a 53-year-old male driver, reported a several-year history of intermittent mild numbness in the right upper limb that he had not sought treatment for. In the weeks preceding presentation, this worsened acutely into severe pain in the right trapezius region radiating to the right upper limb, aggravated by sneezing and accompanied by paraesthesia. His occupation, involving prolonged sitting and sustained neck posture, was a plausible contributing mechanical factor. On examination, there was no motor or sensory deficit; formal provocative testing, reflex examination, and range-of-motion assessment were not documented at the initial visit. He was diagnosed with right-sided cervical radiculopathy with trapezitis and started on short-course medical management with rest. Little relief was reported at early review, and management was escalated.

Cervical spine radiography and MRI of the cervical spine with myelographic sequences were performed. Specialist

neurology review, correlating imaging with clinical findings, refined the diagnosis to right C5–C6 radiculopathy with trapezitis. No electrophysiological testing (nerve conduction study or EMG) was performed.

He was concurrently referred for physiotherapy. Baseline assessment recorded severe right trapezius and radicular pain (NPRS 8/10), severe disability on the Neck Disability Index, restricted cervical rotation (right 45°, left 50°) with corresponding restriction in flexion and extension, a markedly positive neural tension test on the right, severe trapezius tenderness on palpation, frequent paraesthesia, disturbed sleep, and driving tolerance limited to approximately 30 minutes before symptom exacerbation. No new motor or sensory deficit was found. The patient was managed using a two-phase progressive physiotherapy model over 3–4 weeks, with progression based on symptom irritability and clinical response.

Intervention

The patient was managed using a two-phase, progressive physiotherapy programme delivered over 3–4 weeks, with progression from one phase to the next guided by symptom irritability and clinical response rather than a fixed timeline.

Phase 1: Acute Pain Modulation

Goals: reduce radicular pain and upper-trapezius hypertonicity, avoid excessive neural irritation, maintain pain-free cervical movement, improve tolerance of basic activities, and educate the patient on driving posture and symptom aggravation.

- **Electrotherapy:** conventional TENS, 80–100 Hz, 20 minutes per session, applied over the cervical paraspinals and upper trapezius (Figure 1)
- **Thermal therapy:** moist heat for muscular tightness, ice for acute inflammatory symptoms
- **Manual therapy:** gentle cervical lateral-glide mobilisation (Grade I–II); soft-tissue mobilisation and myofascial release of upper trapezius, levator scapulae, and scalenes; upper thoracic mobilisation (Figures 2–3)

Therapeutic exercise:

- Supine chin tucks - 10 repetitions × 3 sets
- Deep cervical-flexor isometric activation - 10-second hold × 10 repetitions
- Scapular retraction - 10 repetitions × 3 sets
- Pain-free active cervical range of motion (all planes) - 10 repetitions × 2 sets
- Median nerve slider - 10 repetitions × 2 sets
- Postural and ergonomic education (driving-specific) - corrected seat and steering-wheel position, mirror adjustment, appropriate headrest height, adequate lumbar support, and regular movement/micro-breaks during prolonged driving
- Trapezius-focused interventions - kinesiology taping, relaxation training, and diaphragmatic breathing, 5 minutes twice daily

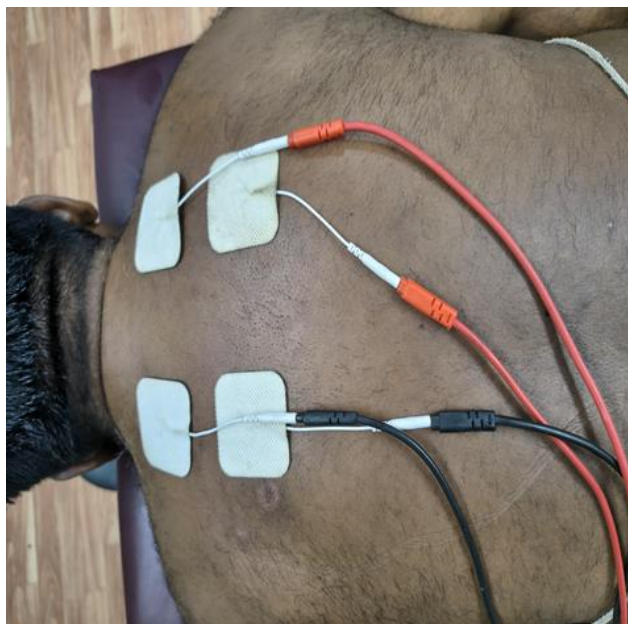


Fig 1: TENS electrode placement over the cervical paraspinals and upper trapezius.

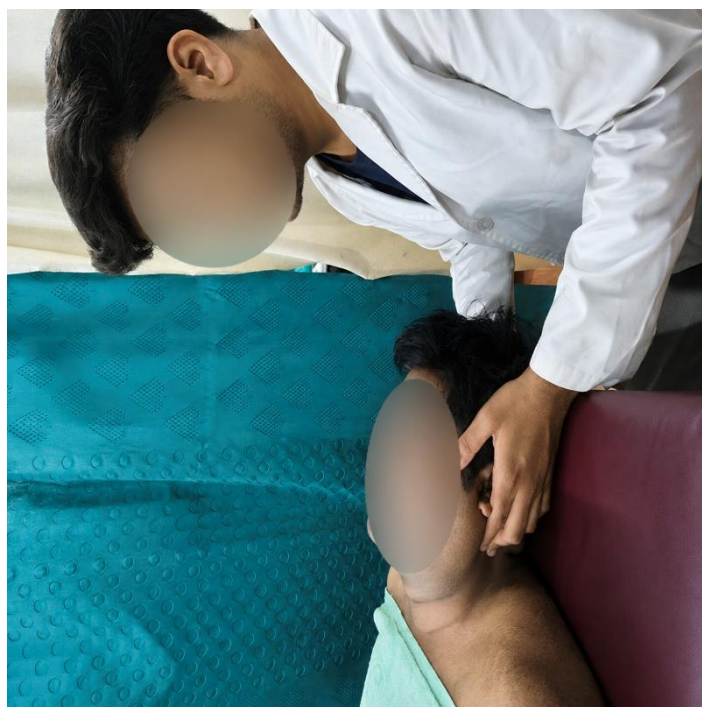


Fig 2: Manual cervical mobilisation performed with the patient in supine.



Fig 3: Soft-tissue mobilisation and myofascial release of the upper trapezius

By the end of Phase 1, pain had reduced from severe to moderate, arm tingling was less frequent and intense, trapezius tenderness had reduced, pain-free cervical range of motion had improved, and sitting, basic-activity, and driving tolerance had improved.

Phase 2: Progressive Rehabilitation and Functional Integration

Entered once pain was decreasing, radicular symptoms were less irritable, exercise was well tolerated, and no new neurological deficit or peripheralisation of symptoms was present.

Goals: improve cervical mobility, reduce residual neural irritability, improve cervical muscle control and scapular stability, restore functional and occupational capacity, and integrate rehabilitation into driving-related activities.

- **Manual therapy:** progressed cervical and thoracic mobilisation, higher-grade mobilisation as appropriate
- **Trapezius treatment:** trigger-point therapy, ischaemic compression, and dry needling (Figure 4)

Therapeutic exercise:

- Cervical isometrics (flexion, extension, lateral flexion) -

- 10-second hold $\times$ 10 repetitions per direction (Figure 5)
- Prone scapular retraction - 10 repetitions $\times$ 3 sets
- Prone Y raises - 10 repetitions $\times$ 2 sets
- Resistance-band rows - 12 repetitions $\times$ 3 sets
- Wall angels - 10 repetitions $\times$ 2 sets (Figure 6)
- Dynamic cervical range of motion - 10 repetitions $\times$ 2 sets
- Pectoral stretch - 30-second hold $\times$ 3 repetitions
- Thoracic extension mobility drill - 10 repetitions $\times$ 2 sets (Figure 7)
- Deep cervical-flexor strengthening, progressed supine to sitting - 10-second hold $\times$ 10 repetitions
- Plank - 20–30 seconds $\times$ 3 sets
- Dead bug - 10 repetitions $\times$ 2 sets per side
- Neural mobilisation - progressed median nerve slider/tensioner, 10 repetitions $\times$ 3 sets
- Aerobic conditioning - walking, 15–20 minutes per day
- Work-specific rehabilitation - sustained driving posture, mirror checking, head turning, reaching, prolonged sitting tolerance, and vehicle entry/exit
- Ergonomic reassessment - seat position, headrest, steering wheel, mirror position, lumbar support, and break frequency.

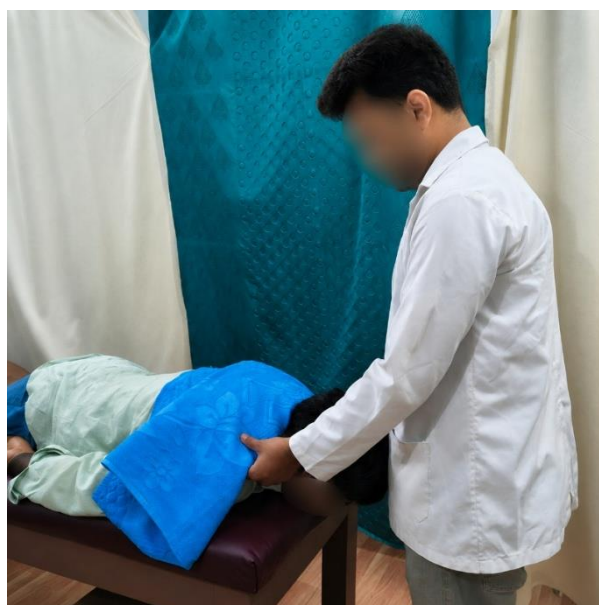


Fig 4: Trigger-point / manual pressure technique applied to the upper trapezius and cervical-thoracic junction, patient prone.



Fig 5: Self-resisted cervical isometric exercise (lateral flexion).



Fig 6: Wall angels exercise for scapular control and postural retraining.



Fig 7: Thoracic mobility exercise (cat-camel stretch).

By the end of Phase 2, pain had reduced to mild and activity-related, paraesthesia was rare, cervical range of motion was near-normal, neural tension testing was negative or minimally symptomatic, trapezius tenderness was minimal, and driving tolerance had substantially improved. A home maintenance programme - cervical and scapular strengthening, postural exercises, and ergonomic reinforcement - was advised at discharge to sustain gains and reduce recurrence risk.

Table 1: Physiotherapy Outcome Measures

Outcome Measure	Baseline	End of Phase 1	Final Review
NPRS pain	8/10	5/10	1–2/10
NDI score (0–50)	37/50 (74% – severe)	24/50 (48% – moderate)	9/50 (18% – mild)
Cervical rotation R/L	R 45° / L 50°	R 60° / L 65°	R 75° / L 80°
Paraesthesia	Frequent	Intermittent	Rare
Trapezius tenderness	Severe	Moderate	Minimal
Neural tension test	Positive, marked	Positive, mild	Negative / minimal
Driving tolerance	~30 minutes	60–90 minutes	>150 minutes

Overall, the patient showed a progressive reduction in pain, neural symptoms, and trapezitis, with improved cervical mobility, postural control, and driving tolerance over a 3–4 week course of structured, phase-based physiotherapy.

Discussion

This patient's age falls precisely within the peak age-specific incidence band (50–54 years) for cervical radiculopathy^[1], lending epidemiological plausibility to the diagnosis. His several-year history of subclinical numbness followed by acute worsening is consistent with a slowly progressive spondylotic process reaching a precipitating threshold. The C5–C6 localisation differs from the C6/C7 predominance typically reported and, combined with the trapezius-dominant presenting complaint, may partly explain why the radicular component was not immediately obvious.

The coexistence of trapezitis and radiculopathy is consistent with literature showing substantial overlap between myofascial and radicular cervical pain syndromes^[2,3], and points to a recurring diagnostic challenge: myofascial pain can mask an underlying radicular process, so reassessment is warranted when trapezius-focused treatment fails to produce the expected response. Because upper-trapezius pain can dominate the clinical picture, physiotherapy assessment and reassessment throughout the course of treatment - not only at initial diagnosis - is important, since interventions targeted at the myofascial component alone would be expected to plateau if the radicular component were not concurrently addressed through neural mobilisation and nerve-root-directed management.

The structured, phase-based physiotherapy programme delivered in this case appears to have been a key contributor to the recovery documented (Table 1). Progression through pain modulation, neural mobilisation, motor control and scapular retraining, and functional/occupational strengthening tracks closely with established rehabilitation principles for cervical radiculopathy, in which graded loading is titrated against symptom irritability rather than delivered on a fixed timeline - an approach broadly consistent with the conservative-first management supported by systematic-review evidence in cervical spondylotic radiculopathy^[4].

Result

Standardised and functional outcome measures - Numeric Pain Rating Scale (NPRS), Neck Disability Index (NDI), goniometric cervical range of motion, neural tension testing, self-reported paraesthesia frequency, trapezius tenderness on palpation, and driving tolerance - were recorded at baseline, at the end of Phase 1, and at final review (Table 1).

The inclusion of driving-specific ergonomic retraining and work-specific rehabilitation is clinically meaningful given the patient's occupation: driving tolerance, tracked here as a functional outcome measure alongside standard pain and disability scales, improved substantially over a short treatment window, a change with direct occupational relevance that standardised instruments such as the NDI do not fully capture.

This report was structured following the CARE guideline framework for clinical case reporting^[5]. Principal limitations include the absence of a formal written radiology report - the C5–C6 diagnosis rests on documented clinical correlation with the MRI rather than an independently verified radiological report - and the absence of electrophysiological confirmation. The physiotherapy outcome measures reported here were recorded by the treating physiotherapist rather than an independent, blinded assessor, a common limitation in single-case reports, and range of motion was measured goniometrically without a standardised repeat-testing protocol documented.

Conclusion

This case demonstrates how a longstanding, previously subclinical numbness can culminate in an acute radiculopathy-trapezitis presentation, and how a structured, phase-based physiotherapy programme - pain modulation, neural mobilisation, motor control and scapular retraining, and functional/occupational strengthening - can achieve substantial functional recovery, including near-complete restoration of occupational driving tolerance, within a short treatment window of 3–4 weeks. Early, structured physiotherapy may merit further prospective evaluation in similarly refractory presentations.

Written informed consent for publication of clinical details and de-identified imaging was obtained from the patient.

References

1. Radhakrishnan K, Litchy WJ, O'Fallon WM, Kurland LT. Epidemiology of cervical radiculopathy: a population-based study from Rochester, Minnesota, 1976 through 1990. *Brain*. 1994;117(2):325-335.

- doi:10.1093/brain/117.2.325.
2. Pagilla V, George BM, Maiya GA, Venkatesan P, Apte S, P R K, *et al.* Prevalence of myofascial pain syndrome among overhead athletes with neck and shoulder pain: a cross-sectional study. *Musculoskelet Care.* 2026;24(2):e70229. doi:10.1002/msc.70229.
 3. Jellad A, Alaqad A, Chaabeni A, Dghim I, Kalai A, Jguirim M, *et al.* Cervicogenic headache in cervical radiculopathy patients: prevalence and associated factors. *La Tunisie Med.* 2026;104(3):417-423. doi:10.62438/tunismed.v104i03.5866.
 4. Luyao H, Xiaoxiao Y, Tianxiao F, Yuandong L, Wang P. Management of cervical spondylotic radiculopathy: a systematic review. *Glob Spine J.* 2022;12(8):1912-1924. doi:10.1177/21925682221075290.
 5. Gagnier JJ, Kienle G, Altman DG, Moher D, Sox H, Riley D, *et al.*; CARE Group. The CARE guidelines: consensus-based clinical case reporting guideline development. *Glob Adv Health Med.* 2013;2(5):38-43. doi:10.7453/gahmj.2013.008.

How to Cite This Article

Tomar T. Physiotherapy management of right-sided cervical radiculopathy with coexisting trapezititis: a case report. *Int J Med All Body Health Res.* 2026;7(3):251-7. doi:10.54660/IJMBHR.2026.7.3.251-257.

Creative Commons (CC) License

This is an open access journal, and articles are distributed under the terms of the Creative Commons Attribution NonCommercial-ShareAlike 4.0 International (CC BY-NC-SA 4.0) License, which allows others to remix, tweak, and build upon the work non-commercially, as long as appropriate credit is given and the new creations are licensed under the identical terms.