Extending Healthcare to Rural India

Through Mobile Medical Units

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List of Abbreviations

ANM	:	Auxiliary Nurse Midwife
CHC	:	Community Health Centre
CMO	:	Chief Medical Officer
GDPR	:	General Data Protection Regulation
HIPAA	:	Health Insurance Portability and Accountability Act
LT	:	Lab Technician
M&E	:	Monitoring and Evaluation
MBBS	:	Bachelor of Medicine and Bachelor of Surgery
MMU	:	Mobile Medical Units
OPD	:	Outpatient Department
PHC	:	Primary Health Centre
THF	:	The Hans Foundation

Acknowledgements

We extend our heartfelt appreciation to the government officials, particularly those in the state health departments and district administrations, whose collaborative spirit and strategic inputs have strengthened our programme's foundation. We are thankful for the valuable support from village health workers, volunteers and community members. Their inputs and active participation have been instrumental in ensuring that the MMU programme is robust and cognisant of local contexts.

We would like to express our sincere gratitude to all Project Managers, Project Coordinators and MMU team members whose invaluable contributions made this report possible. Their dedication, expertise and commitment to excellence have been instrumental in documenting the progress and impact of our Mobile Medical Units.

Their collective efforts have not only enhanced the quality of this report but have also contributed significantly to the success of our healthcare initiatives on the ground.

Foreword

Shweta Rawat,
Founder and Chairperson,
The Hans Foundation

Community health is the bedrock of societal progress, yet for many in India access to quality healthcare remains a challenge. While the country has made remarkable strides in medical technology and expertise, millions of rural communities still grapple with inadequate access to quality health services. For these people, healthcare entails travelling long distances to cities where prohibitively high costs either lead to delayed treatments or push entire families into poverty and in some cases, both.

At The Hans Foundation (THF), we firmly believe that no family or individual should have to prioritise between their savings and healthcare. For this, during the last 15 years, we have supported marginalised communities by bringing essential health services and economic opportunities closer to them. Through these years, some of our most enduring interventions have addressed the healthcare requirements of various vulnerable groups from women and children to the elderly and persons with disabilities. We recognise good health as a powerful enabler for people to contribute more fully to their communities.

Acknowledging the challenges that people face in accessing quality healthcare, we launched the Mobile Medical Unit (MMU) programme. The idea was to bring medical services such as consultations, treatments, medicines and diagnostics closer to the people. From a small pilot initiated with 4 MMUs in Pauri district of Uttarakhand in January 2021, we have created a robust ecosystem with 514 MMUs spanning 10 states in India. Today, the MMU program has become one of our most impactful initiatives, reaching millions of people in underserved areas across these states.

However, these numbers alone do not define our success – we also set store by the depth of our engagement with communities. Our vision extends beyond immediate medical care. Through MMUs, we are also keen to affect a paradigm shift in health-seeking behaviours and community engagement.

Besides the MMU staff, we have mobilised village health workers, Social Protection Officers (SPOs) and the frontline ASHA and ANM (Accredited Social Health Activists and Auxiliary Nurse Midwives) for continuous engagement with communities and raising awareness about health issues. The mobile units also work in partnership with government bodies, corporations, and other civil society organisations which help us employ our collective strength to amplify impact.

As we continue to scale the MMU model, we acknowledge that the road ahead is filled with challenges. We are certain that our commitment to inclusion, community empowerment, and sustainability will help us overcome all obstacles and leverage opportunities that come our way. We are excited about the possibilities that lie ahead – the people we can reach, the communities we can transform, and the equitable future we can help build.

Foreword

Manoj Bhargava,
Founder and Principal Funder,
The Hans Foundation

One of the defining challenges India faces today is the enormous inequality in the delivery of essential services. Creating a lack of access to affordable and quality services, these gaps hamper opportunities and reinforce conditions that push many people to the margins of society. Since our inception in 2009, we have tirelessly worked to bring vital services and equitable opportunities to the marginalised.

For us, healthcare is one of the cornerstones upon which individuals can build their dreams and aspirations. It is also one of the sectors in India that critically need equitable delivery. Millions of people, especially in rural and remote areas still lack access to basic health services even as the rise in chronic, non-communicable diseases perpetuates cycles of poverty and economic disadvantage. It is here that The Hans Foundation's (THF's) interventions make a profound difference.

From Early Intervention Centres and surgeries that support children, to Hans Renal Care Centres that provide life-saving dialysis sessions, we strive to address the multifaceted healthcare needs of communities. Our focus on mental health, sanitation, and nutrition further underscores our holistic approach to wellbeing.

Among these programmes, our Mobile Medical Units (MMUs) have carved a niche as a healthcare ecosystem for the grassroots. These buses, equipped with medical staff and equipment, bring essential treatment and diagnostics to the doorsteps of those in remote and rural areas. With enhanced access, affordability, and quality of services, our MMUs deliver the promise of a healthier future to numerous individuals and communities.
The journey towards universal healthcare is long and challenging, but it is one worth undertaking. We believe that access to care not only improves lives but also strengthens the very fabric of our society.

As we move forward, we invite you to join us in this crucial endeavour – because a healthier India is a stronger, more equitable India for all.

MMU Project at Glance

514	Number of MMUs
10	Number of state
61	Number of district
12,289	Number of Village
48,73,171	Total Unique Beneficiaries
2,05,517	Total Out-patient Department (OPD) Sessions
₹4363	Reduction in healthcare expenses
30 minutes	Average travel time to MMU for people in rural areas

1,72,347

Total patient consultations for Non-Communicable Diseases

99.3%

Respondents' rating of MMU staff on professionalism

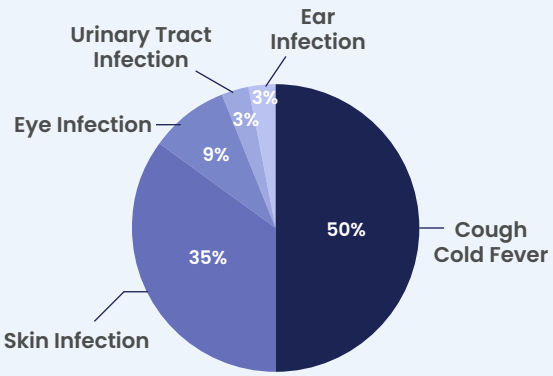
71%

Reduction in out-of-pocket expenditure for the elderly

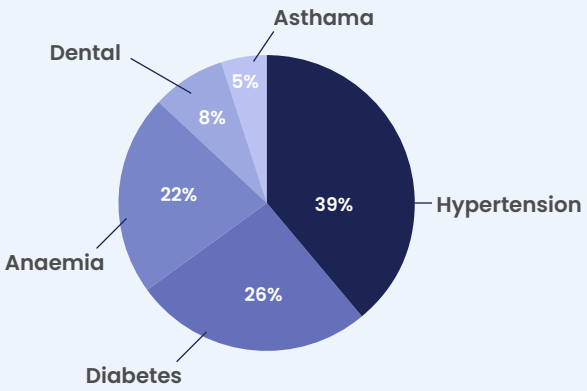
60%

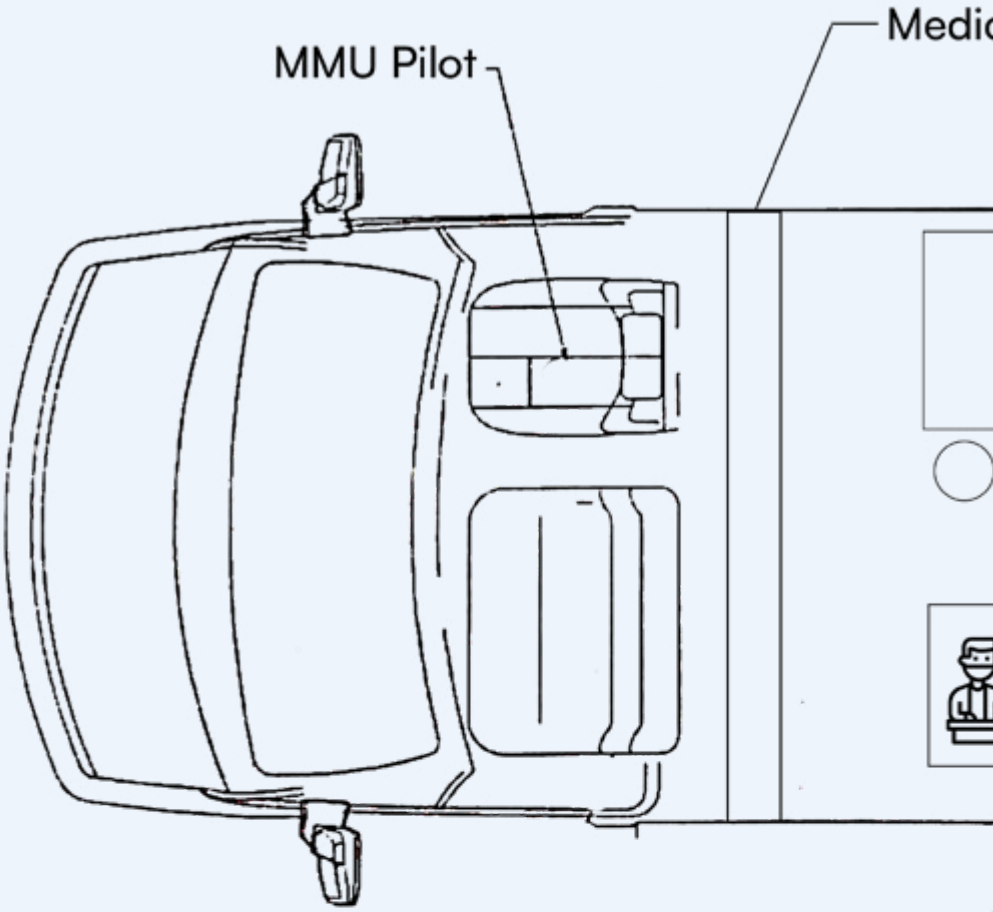
Female beneficiaries

Non- Communicable Diseases(Top 5 reported)

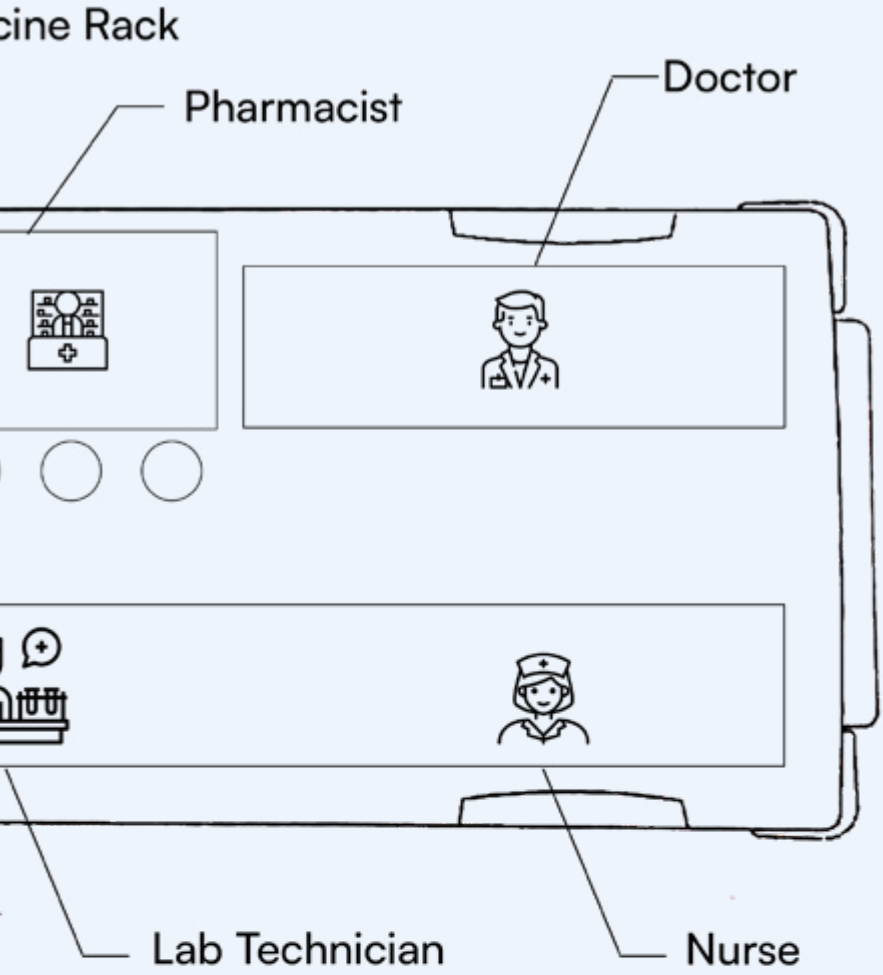


Communicable Diseases (Top 5 reported)




MMU Pilot
Medic


PATIENT TRANSPORT
AMBULANCE
HANS MOBILE MEDICAL UNIT


cine Rack
Pharmacist
Doctor
Lab Technician
Nurse


FORCE
HP 31D 0679

Executive Summary

Extending Healthcare to Rural India

Access to healthcare remains a significant challenge in rural India, where long distances, high costs, and a lack of facilities prevent many from receiving the care they need. In response, The Hans Foundation launched Mobile Medical Units (MMUs) to deliver healthcare directly to underserved communities. These mobile clinics have reached over 4.8 million individuals across 12,000 villages in 10 states, reshaping the healthcare landscape by making quality services more accessible.

The MMUs serve as traveling health centres equipped to provide a range of services, from routine check-ups to managing chronic conditions. By collaborating with local health workers and integrating into existing healthcare systems, these units have improved health outcomes and reduced the financial burden on families, all while fostering a culture of health-seeking behaviour.

Key Outcomes and Impact

MMUs have enhanced accessibility, reduced costs, and enabled chronic disease management for people in rural areas

30 minutes

Average travel time to MMU for people in rural areas

71%

Reduction in out-of-pocket expenditure for elderly patients

96%

Diabetes patients receive regular follow-ups and treatment every two weeks

These results demonstrate improved statistics and a transformative shift in how rural communities approach healthcare.

Ensuring Quality and Sustainability

The MMU programme is guided by a robust Monitoring and Evaluation (M&E) framework, which tracks everything from patient demographics and service delivery to health outcomes and operational efficiency. Real-time data collection allows the team to make swift adjustments, ensuring that the MMUs continue to meet the needs of the communities they serve. This data-driven approach has been instrumental in refining operations and expanding the reach of the programme.

Addressing Regional Disparities and Operational Challenges

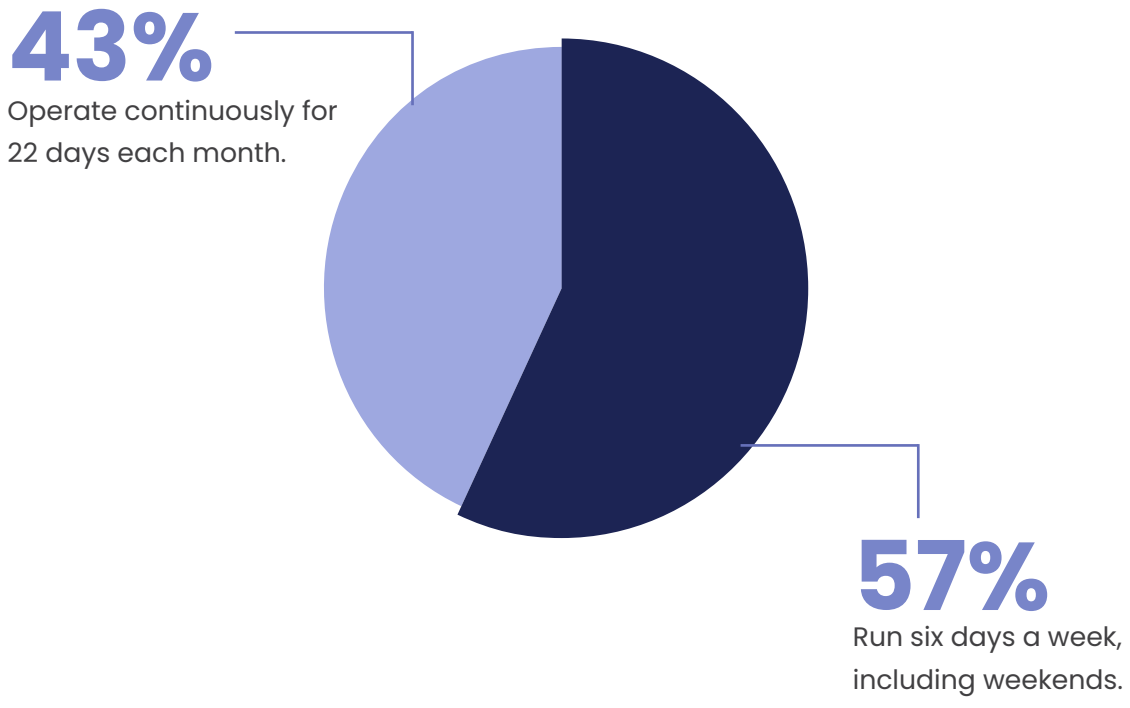
Despite the programme's success, regional disparities remain a challenge. For instance, while in states like Punjab and Uttarakhand, MMUs cover 24 villages each month, Nagaland falls behind, covering only 19. Similarly, while some states have near-perfect adherence to vehicle maintenance protocols, a few still lag. These variations point to the need for continuous improvements and targeted interventions to ensure consistent service quality across all regions.

The Mobile Medical Units are quite active, typically operating six days a week and covering multiple villages every month. Some MMUs ensure continuous services for 22 days a month followed by an 8-day break. This allows the units to leverage the service of specialists and doctors from other cities.

While travel times can vary, most units manage to reach their destinations within two hours, ensuring minimal wait times for patients.

Here's a quick look at how the MMUs are operating:

Days and Hours of Operation of MMUs:



Recommendations for the Future

To build on its achievements, going forward the MMU programme will focus on

Optimising Operations:
Use data to refine routes and schedules, minimising transit times and maximising service hours.

Strengthening Community Engagement:
Leverage local influencers and community organisations to increase awareness and participation.

Improving Supply Chain Management:
Develop more efficient logistics to prevent stockouts and ensure continuous availability of medical supplies.

Looking Forward: A Pathway to Broader Impact

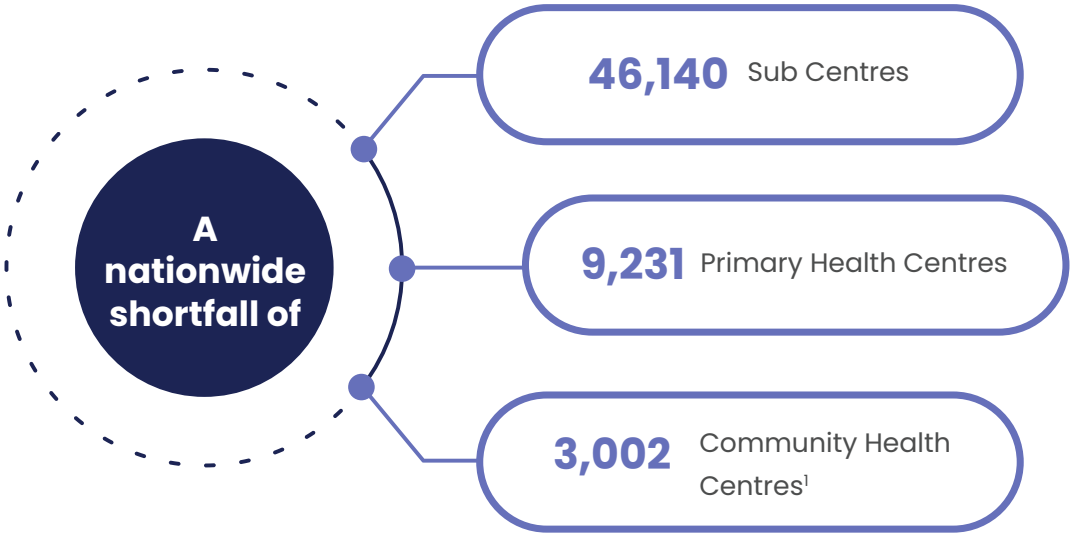
The MMU initiative has grown significantly—from 44 units in three states in 2022 to 514 units in ten states by mid-2024. As the programme continues to expand, it is poised to address broader healthcare challenges, such as maternal and mental health, while emphasising preventive care and health education. The data collected through these units is not just helping to improve service delivery; it's also informing public health policy and guiding resource allocation at a larger scale.

With its adaptable and scalable model, the MMU programme has the potential to serve as a blueprint for similar initiatives in other underserved regions, both in India and globally. By continuously evolving and refining its approach, it ensures that healthcare is not a privilege reserved for a few, but a fundamental right accessible to all.

Bridging the Healthcare Divide with Mobile Medical Units

In Nawapara village, 49-year-old Rekha Devi's story illuminates the healthcare crisis gripping rural India. A mother of five, Rekha's life changed dramatically when she was diagnosed with diabetes. With her family surviving on a meager Rs. 5,000 per month, Rekha took a job at a local school. However, her illness soon forced her to quit, as she was unable to manage the Rs. 2,400 monthly treatment cost and the expenses that the 10-12 kilometer journey to the nearest health centre entailed.

Rekha's struggle is emblematic of larger, systemic issues in rural healthcare – where 65% of the population has access to only one-third of the healthcare resources. The disparity is evident in the lack of resources even at the most basic levels:



31%

of the rural population travels more than 30 kilometers for medical care.

8%

of Primary Health Centres lack doctors, 39% lack lab technicians, and 18% lack pharmacists.

1. Source: [Rural Health Statistics 2020, National Health Mission]

These shortages render the healthcare ecosystem incapable of dealing with the rising disease burden in India.

4.7 million Deaths caused by NCDs in India in 2017[2]

65% Deaths from NCDs occurred below the age of 70[3]

1.2 billion People are vulnerable to communicable diseases in India

In rural India, NCDs continue rising, necessitating medical interventions[4]:

15- 49 age group have anaemia	**58.5%**	**27.4%**
15+ age group report high blood sugar levels	**12.3%**	**14.5%**
15+ age group have elevated blood pressure	**20.2%**	**22.7%**

2. Menon, Geetha R., Jeetendra Yadav, and Denny John. "Burden of non-communicable diseases and its associated economic costs in India". Social Sciences & Humanities Open, Volume 5, Issue 1, 2022. Consulté le October 18, 2024. https://www.sciencedirect.com/science/article/pii/S2590291122000109.
3. ibid
4. NFHS-5

The consequences are severe: treatment delays exacerbate illnesses, and the financial burden of healthcare pushes an estimated 55 million Indians into poverty annually.

In this context, MMUs by The Hans Foundation are nothing short of a boon. The MMUs are essentially health facilities on wheels that serve hard-to-reach areas and people with low finances and mobility issues. These units open doors to marginalised communities and help them access quality and affordable healthcare. Placing people at the centre of efforts, they are meticulously tailored to local contexts, encompassing infrastructure development, capacity building, awareness, and community engagement to ensure sustainable and effective healthcare delivery.

Currently, a network of 514 MMUs serves villages across 9 Indian states – Assam, Himachal Pradesh, Jharkhand, Nagaland, Punjab, Rajasthan, Uttar Pradesh, Uttarakhand, and Meghalaya. Each unit offers a comprehensive package of services, including free medicines, diagnostic tests, counselling, and preventive measures such as periodic testing of drinking water at usage points. The units also conduct home visits for the elderly and Persons with Disabilities (PwDs), referring critical cases to tertiary care centres when necessary.

Fortunately, for Rekha, the arrival of a MMU in 2023 marked a turning point. With free doorstep healthcare, her high blood sugar levels were diagnosed and treated. She received nutrition and lifestyle advice, and free medicines - which significantly reduced her monthly healthcare expenses. Experiencing relief from various symptoms, Rekha was able to start a small *paan* shop, through which she could add Rs. 1,500 per month to her family's income.

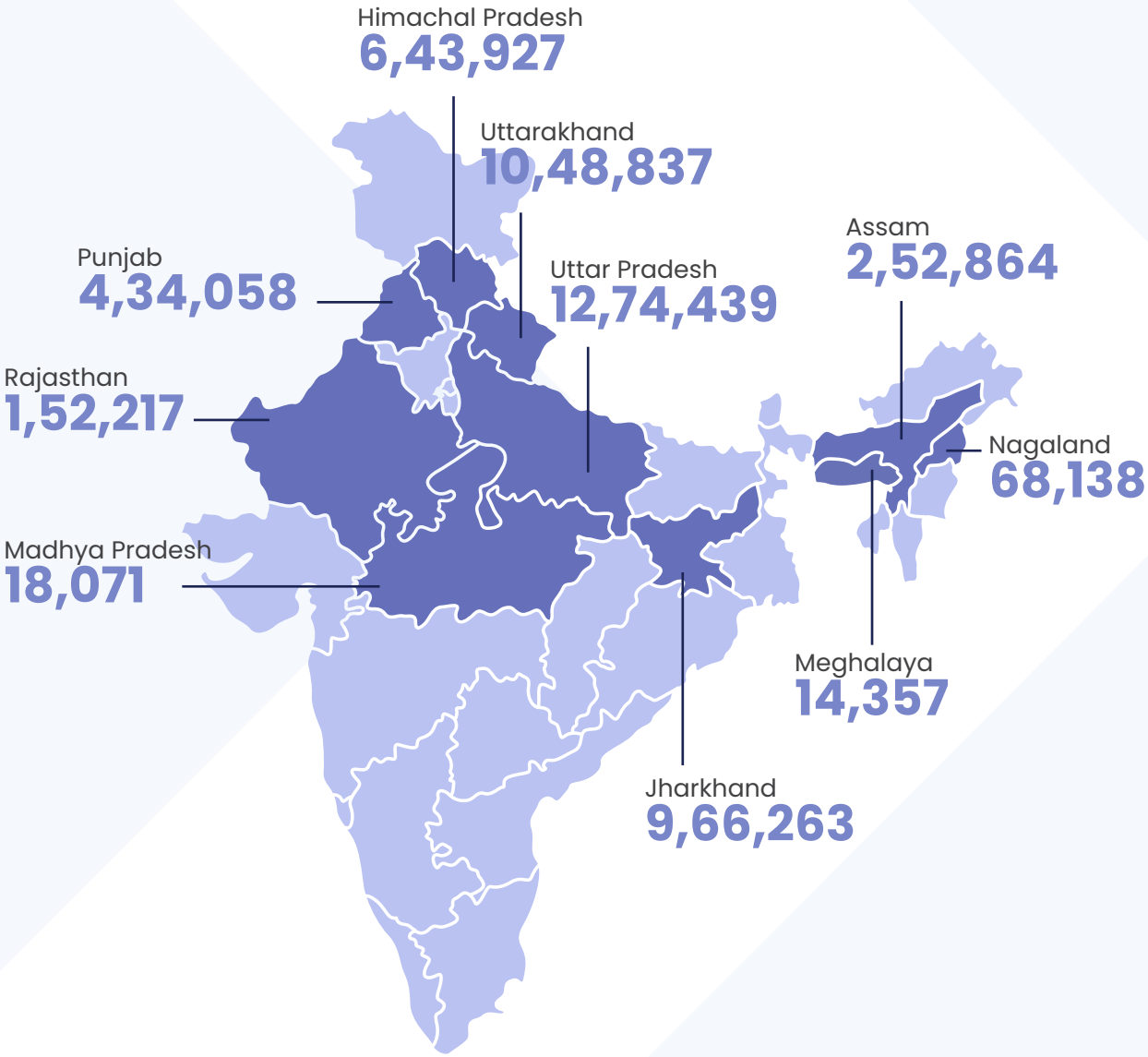
Universalising healthcare delivery in rural India requires innovative approaches. Initiatives like Mobile Medical Units demonstrate the potential to bridge gaps in the healthcare ecosystem gap, increase health-seeking behaviour, and improve health outcomes. For millions of people in underserved communities, MMUs represent a future where quality healthcare is a reality for all Indians, regardless of their geographic or economic circumstances.

MMU Impact at a Glance

Unique Beneficiaries

Total Unique Beneficiaries

48,73,171

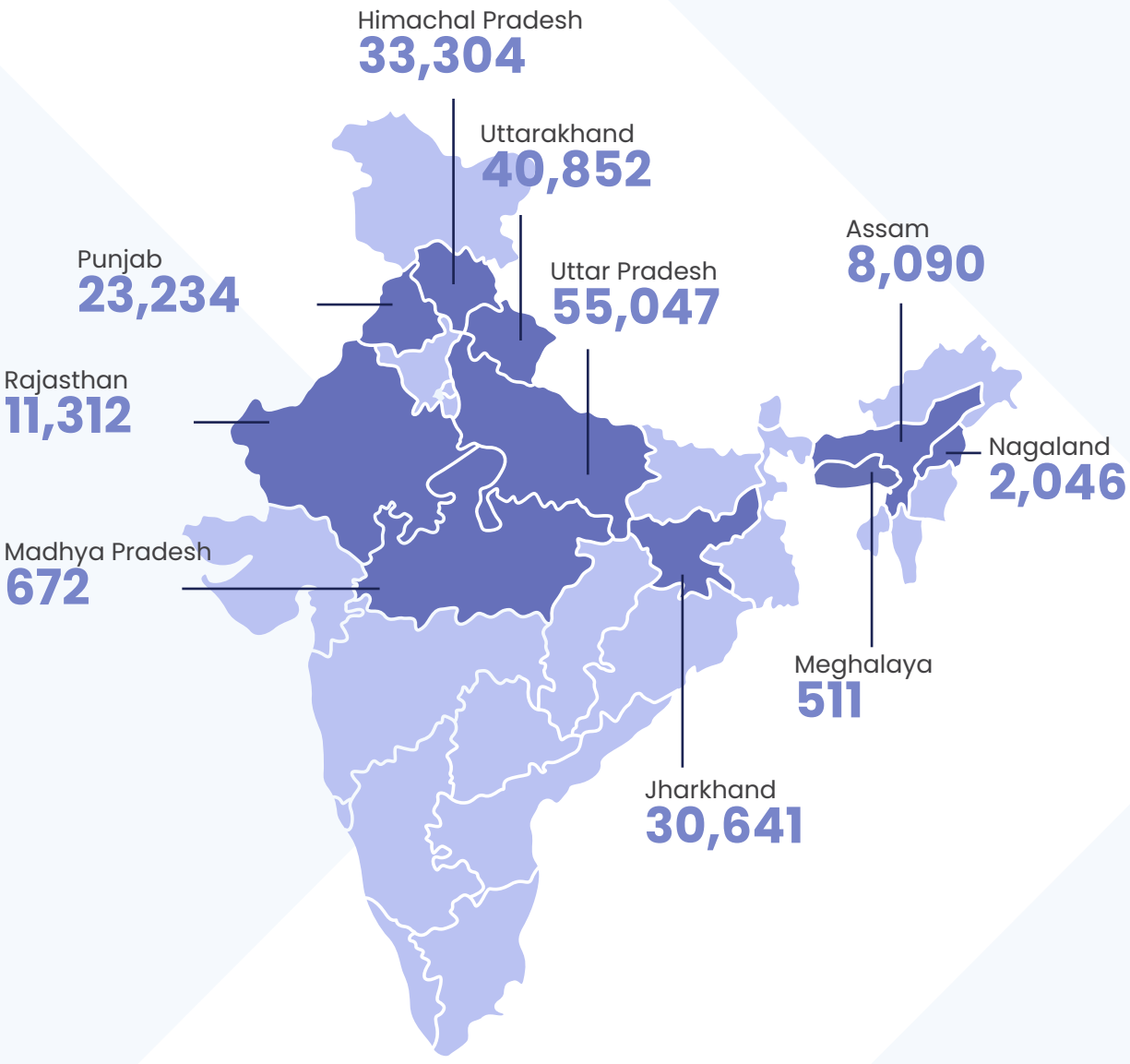


Data Source: MMU Project Monitoring Dashboard (till September 2024)

OPD Sessions

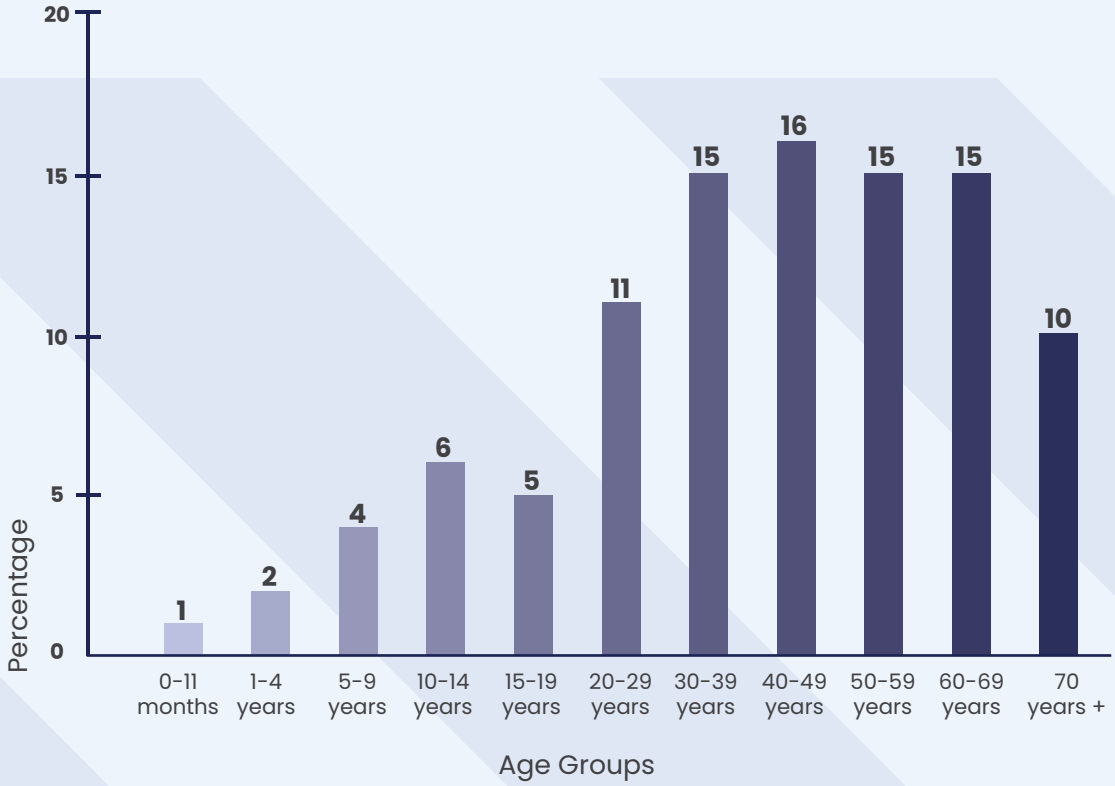
Total OPD Sessions

2,05,517

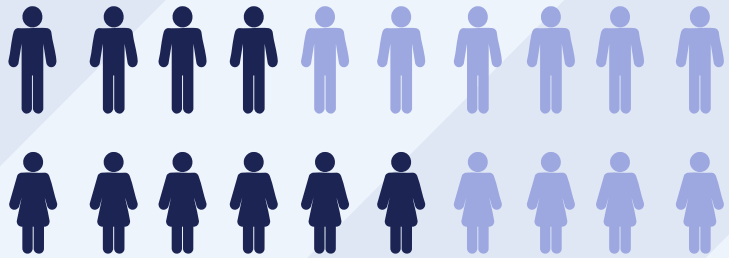


Data Source: MMU Project Monitoring Dashboard (till September 2024)

Age-wise Beneficiaries



Gender Ratio



40% Male

60% Female

Some Quick Facts

(As on Sep 2024)

514
MMUs are currently serving communities

10
states have been covered so far

4.8
million individuals have been reached

12,289
villages now have access to healthcare

MMU Journey

Bringing Healthcare Closer to the Unreachable

Imagine living in a village tucked away in the mountains or in a remote part of the countryside, where the nearest medical aid is hours away. For many in India's rural areas, that's a reality. This is where the Mobile Medical Unit (MMU) initiative steps in—a unique solution that quite literally drives healthcare to people's doorsteps.

These MMUs are much more than just vehicles equipped with medical tools. They are lifelines, especially for those battling both geographical challenges and financial barriers. With 514 MMUs rolling across ten states, such as Uttar Pradesh, Uttarakhand, Jharkhand, and Himachal Pradesh, they ensure that people in the most underserved areas receive basic health services without the hassle of travelling long distances.

Each MMU operates with one goal in mind: to make healthcare available, accessible, and affordable for every individual in need. By focusing on building local infrastructure, capacity development, and engaging communities, these units are changing the healthcare landscape for millions.

How MMUs Make a Difference

Operating in areas where no other healthcare options exist, MMUs follow some core principles that ensure they're delivering care efficiently:

Fixed Time, Fixed Place
Each village is visited on a regular schedule, ensuring that people know exactly when and where they can access services.

Comprehensive Care
MMUs offer a standard package of healthcare services - from medical checkups to diagnostic tests and counselling.

Government Collaboration
Working closely with local health authorities to enhance the impact and reach of services.

Community Engagement
Involving local populations to spread health awareness and encourage more people to seek medical help.

The Team for Each MMU

Every MMU is more than just a clinic on wheels. It's staffed with a dedicated team that makes healthcare accessible, no matter how challenging the conditions:

- **Medical Doctor (MBBS):** Provides essential treatments and health consultations.
- **Social Development Officer:** Connects with the community to raise health awareness and promote healthy behaviours.
- **Village Health Workers:** Raise awareness about health and nutrition and inform community members of MMU visits.
- **ANM/Nurse:** Engage in community outreach to understand and address health needs. Additionally, they maintain accurate patient records and collaborate with other healthcare professionals to ensure comprehensive care.
- **Pharmacist:** Dispenses medications, manages supplies, and offers guidance on medication use.
- **Lab Technician (LT):** Runs diagnostic tests and ensures samples are processed with precision.
- **Driver:** Safely navigates through tough terrains to reach remote villages.

Impact Beyond Numbers

The results are clear: out-of-pocket healthcare expenses for the elderly have decreased by a staggering 71%. MMUs have built a network of care for managing non-communicable diseases, with referral systems in place across states like Himachal Pradesh, Uttar Pradesh, and Uttarakhand. Regular checkups have become a norm, with 88% to 96% of diabetes patients returning every 15 days for consultations and treatment.

In Jharkhand and Uttar Pradesh, moderate anaemia cases among women have dropped from 55.3% to 44%, and for nearly everyone—97% to 99% of beneficiaries—the time it takes to reach an MMU is under 30 minutes. The best part-almost 94% of patients say that the professionalism of the MMU staff is 'excellent.'

Reduced out-of-pocket expenses

Improved access to care by reducing travel time

Improvement in health indicators for chronic disease patients

Increased health awareness and health-seeking behaviour

Real Voices, Real Stories

Take Brijbala Devi from Jhatgaon, Ranchi, for example. She recalls, "I had severe back pain and was suffering a lot. But ever since I started taking medicines from The Hans Foundation, I've felt great relief."

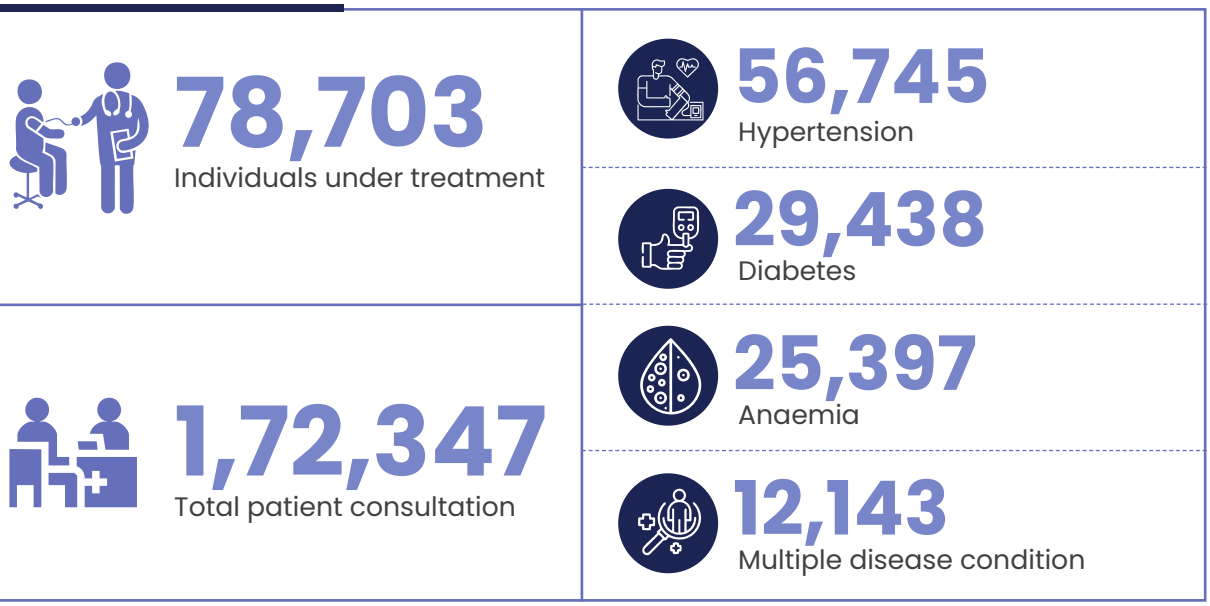
Then there's Ahilya Kumari, also from Jhatgaon. "I am disabled, confined to a wheelchair, and diabetic. The MMUs have helped me control my blood pressure and diabetes. Earlier, I had to use my hands to lift my legs, but now I don't need my hands. My strength has improved so much."

These MMUs are more than just medical units. They are a beacon of hope for communities that have been left behind for far too long. By aligning with the Aspirational Districts Programme and partnering with government initiatives, they ensure that even the most marginalised populations are given the care they deserve.

Individual Patient Tracking

Based on the MMU intervention data till March 2024, the most prevalent non-communicable diseases (NCDs) in the intervention villages were anaemia (29%), hypertension (26%), and diabetes-related issues (20%). Consequently, From April 2024, an individual patient tracking system was implemented to monitor the health conditions of patients suffering from these three diseases

Current Status



Data Source: MMU Project Monitoring Dashboard (till September 2024)

Monitoring and Impact Assessment

A Closer Look

When it comes to transforming rural healthcare, having the right tools to measure progress is essential. The Hans Foundation's MMU programme uses a comprehensive monitoring and impact assessment strategy to ensure every visit, every diagnosis, and every patient's experience contributes to a healthier community. It's not just about delivering services—it's about making a meaningful difference and understanding how those efforts are paying off.

A Vision for Change: The Theory Behind the Action

The Hans Foundation's approach to rural healthcare is rooted in a 'Theory of Change' model, which focuses on two main pillars: structured healthcare service delivery and active community involvement. This model is designed to bring quality healthcare closer to those who need it the most, while also fostering health literacy and encouraging people to seek timely medical help.

Keeping a Finger on the Pulse: The Monitoring and Evaluation Framework

To ensure that the programme is on the right track, a robust Monitoring and Evaluation (M&E) framework is in place. This system goes beyond just keeping count of services provided. It's about measuring real impact—tracking health outcomes, understanding behavioural changes, and using that information to refine and improve the programme continuously.
The M&E framework serves several purposes:

1. **Tracking Performance and Impact:** How well are the MMUs delivering healthcare? Are we seeing improvements in the community's health?
2. **Measuring Health Knowledge:** Are people more aware of health issues? Are they taking proactive steps to prevent illnesses?
3. **Data-Driven Insights:** Using the data collected to identify what's working, what isn't, and where the programme can expand or adjust.
4. **Demonstrating Value:** Showing stakeholders and donors that the programme is making a tangible difference and has the potential to be scaled up.

Objective 1

Improving Access to Quality Health Services

The first objective is all about accessibility. It aims to enhance the well-being of people of all ages by making sure quality health services are available to everyone in the community. Here's what success looks like:

- Lower rates of acute and chronic diseases in the communities served.
- An increase in the number of successfully treated cases.
- MMUs consistently being rated as "Excellent" by those who rely on them.

To make this happen, the foundation has established a system for delivering uninterrupted primary healthcare services, focusing on both communicable and non-communicable diseases. Key performance indicators include:

- Percentage of MMUs operating for at least 22 days a month.
- Average number of outpatient sessions held per unit.
- Reduction in disease prevalence rates.
- High percentage of below-poverty-line beneficiaries receiving services.

Data is collected through a specialised MMU application that captures detailed records from every visit, helping the team keep a close eye on trends and respond quickly when adjustments are needed.

Objective 2

Promoting Health Awareness and Service Uptake

The second objective is focused on increasing the use of health services and boosting health knowledge across all age groups. This means encouraging more people to seek medical care and making sure they understand basic health and hygiene principles.
To achieve this, the MMUs engage communities through awareness campaigns, educational sessions, and household visits. The results are measured not just by the number of people receiving services, but by changes in their health knowledge and attitudes.

Components of the Monitoring and Evaluation System

The M&E framework stands on a few key components:

- **Regular Data Collection:** Using the MMU application, the team gathers data on patient demographics, services provided, and overall operations during each visit.
- **Periodic Assessments:** Independent agencies conduct baseline, midline, and endline evaluations to get a holistic view of the programme's impact.
- **Stakeholder Collaboration:** Meetings with local health officials ensure that MMU operations are aligned with broader health initiatives and strategies.
- **Community Feedback:** Listening to feedback from the people being served helps the MMUs continuously adapt and improve.
- **Capacity Building:** Ongoing training for staff members ensures high-quality service delivery and reliable data collection.
- **MMU Quality Assessment and Patient Satisfaction:** To ensure high-quality services and patient satisfaction, THF conducts an annual third-party survey at the end of each financial year. Based on the findings and recommendations from this survey, appropriate decisions are made to enhance service quality.
- **Standard Review Mechanism:** Established standardised review mechanisms across all hierarchical levels of the MMU Programme, ensuring consistent evaluation using common indicators across all project locations.

Commcare : CommCare is a mobile data collection platform that allows users to build and deploy custom applications without programming skills. The platform is open source and ensures data privacy and security, meeting standards like GDPR and HIPAA.

Power BI : Power BI is a data visualisation tool that integrates with various data sources to create detailed reports and dashboards. It offers interactive visualisation for in-depth data exploration. The user-friendly interface and AI capabilities make it accessible for users with varying technical skills.

This structured approach allows The Hans Foundation to measure its success in real-time, make informed decisions, and showcase the programme's impact on rural healthcare. With the right balance of numbers and narratives, the MMU programme paints a realistic picture of healthcare delivery and transforming communities.

Understanding the Impact

Key Findings from the MMU Operations

The journey of the Mobile Medical Units is not just about delivering healthcare - it's about connecting with communities, building trust, and creating lasting change. The programme's assessment sheds light on how these units have become an essential part of rural healthcare in India, overcoming challenges of distance, accessibility, and awareness. Let's dive into some of the key findings based on data collected between April 21 and May 31, 2024, and see how MMUs are transforming healthcare delivery in underserved areas.

Quality of Healthcare Delivered

The MMUs have made a significant impact by providing crucial healthcare services to people who would otherwise have little to no access to medical help. Their efficiency, strategic placement, and strong community engagement have ensured that the services truly reach those in need. While overall standards are high in terms of vehicle cleanliness, safety, and maintenance, there are some regional differences that show room for improvement. Patient satisfaction surveys point out that privacy, communication, and service delivery are critical aspects for maintaining trust and ensuring a positive experience.

Summary of MMU Quality Assessment Study - 2024

The findings presented below are based on a comprehensive study, conducted by independent third-party experts. The study evaluated 151 Mobile Medical Units (MMUs) across eight states and 36 districts. The assessment employed a cross-sectional research design with quantitative data collection methods. Two structured questionnaires were developed: one for MMU quality assessment through staff interviews and observations, and another for patient satisfaction. Five beneficiaries per MMU were randomly selected, ensuring gender balance, totalling approximately 755 respondents.

To keep everyone in the loop about their visits, the MMUs collaborate with local health workers and volunteers. From door-to-door notifications to public announcements, they ensure that people know exactly when and where they can access the services. This strong community mobilisation means that MMUs can be positioned in accessible spots within the villages, maximising their reach and effectiveness.

Here's a quick look at how the MMUs are operating:

Travel Time and Coverage

25%	of MMUs need less than an hour to reach their assigned locations.
61%	take between 1-2 hours on average.
22	Average number of villages covered by MMUs per month

Community Engagement and Information Dissemination

96% of MMUs had their tour plans approved by the Chief Medical Officer (CMO).

97.3% Respondent had prior knowledge of MMU visits.

Ways to inform communities of MMU visits

71.3% Informed by local health workers or volunteers

16% Informed through community announcements

12.7% Informed through door-to-door notifications and other means

Vehicle Quality and Safety Standards

The MMUs maintain a high standard of cleanliness and safety, ensuring that patients receive services in a sanitary and well-maintained environment. However, there are some variations in practices like fumigation and bio-waste disposal. Bio-waste management is good, but there's variation across regions in daily disposal practices.

Cleanliness and Maintenance

- 90% of MMU vehicles are clean on the outside, while 93% are clean inside.

Bio-waste Disposal Frequency:

- 54.3% Dispose bio-waste daily
- 25.8% Dispose bio-waste twice a week

Bio-waste Disposal Sites

- 67.6% Disposal is at CHC
- 13.2% Disposal is at PHCSafety and Supplies

Safety and Supplies

- 100% essential safety features present in all MMUs
- 100% States have adequate medicine stocking
- 0 Stockouts in last 15 days

Staff Conduct and Patient Interaction

One of the cornerstones of the MMU programme is the professionalism of its staff. In most states, the MMU staff are praised for their conduct, communication, and empathy towards patients. However, there's variability in how privacy and confidentiality are maintained during consultations, indicating some areas that need attention.

Professionalism

99.3%

MMU staff demonstrated excellent/ good professional ethics when communicating with patients

Privacy

Rating on maintaining privacy and confidentiality

90%

Beneficiaries acknowledged that MMUs effectively upheld privacy and confidentiality

The Road Ahead

The findings from the assessment show that while MMUs have become a reliable source of healthcare in many rural areas, there's always room for improvement. Addressing regional disparities, enhancing community outreach, and maintaining high standards in service delivery are essential to the continued success of the programme. With each visit, each diagnosis, and each treatment, the MMUs are not just bringing healthcare—they're bringing hope and positive change to the lives of people in rural India.

Impact on Communities

Stories of Change and Hope

In rural and underserved parts of India, access to quality healthcare is often a distant dream. But with Mobile Medical Units on the move, that dream is becoming a reality for many. These units are making a real difference by reducing the health inequalities that have long plagued these areas. From cutting down travel times to bringing specialised care right to people's doorsteps, MMUs are helping communities that need it most.

Consider this: in a country where 31% of rural residents have to travel over 30 kilometers just to see a doctor, MMUs are transforming the way people receive care. By significantly reducing travel times and costs, they've made healthcare accessible for the elderly, people with disabilities, and those who simply couldn't afford the journey.

96%	People have quick access to healthcare
30 minutes	Maximum time to reach an MMU
71%	Reduction in expenses for the elderly
₹7361	Healthcare expenses incurred before MMUs
₹2998	Healthcare expenses after MMU intervention
₹4363	Reduction in healthcare expenses because of MMUs

MMUs are filling the gaps left by a severe shortage of healthcare facilities and staff in rural India. With more than 46,000 Sub Centres, 9,000 Primary Health Centres, and 3,000 Community Health Centres missing across the country, these units are bridging a vital gap. They offer everything from basic consultations to specialised care for chronic diseases—compensating for the absence of permanent healthcare infrastructure.

Managing Chronic Conditions, Improving Health Outcomes

Regular, accessible care through MMUs prevents the worsening of illnesses due to delayed treatments. Their presence is crucial for managing chronic conditions like diabetes and anaemia.

Diabetes Management

96%

of diabetes patients visit the MMUs every 15 days for check-ups, diagnosis, and medication.

Anaemia Reduction

11.3%

Reduction in anaemia cases among women

Haemoglobin levels

8%

Increase in haemoglobin levels among women

But it's not just about providing medical care. MMUs also play a critical role in raising health awareness and educating communities. This comprehensive approach helps tackle lack of health-seeking behaviour and understanding about common health issues.

Community Engagement

Village Health Workers conducted awareness sessions for Adolescents and adults related to health and nutrition

Case Study 1

Shyam Lal's Story of Transformation

For over 15 years, Shyam Lal Maurya, a 52-year-old weaver from Harsos village in Varanasi, struggled with a chronic fungal infection. The condition took a toll on his life—halving his income, subjecting him to social stigma, and plunging him into debt and depression. But things took a turn when an MMU began operating in his area.

With free consultations and proper medication, Shyam Lal saw a dramatic improvement in just two weeks. Regular follow-ups ensured that his condition remained under control. Not only did his health improve, but so did his financial situation. He managed to secure a job, raising his monthly income to Rs. 10,000. As his physical and mental well-being improved, Shyam Lal broke free from social barriers.

This is just one example of how MMUs are changing lives and giving hope to those who had almost given up.

Case Study 2

Expanding Healthcare Access in Rural Varanasi

In February 2023, ROADIS and The Hans Foundation launched a new MMU initiative in rural Varanasi, Uttar Pradesh, aimed at underserved groups, particularly women, the elderly, and people with disabilities. These MMUs provided a range of services, including outpatient care, free medicines, diagnostic tests, and health education.

Driven by the efforts of "Hans Sakhis" (village workers), the initiative organised special health camps and education programmes, including sessions on menstrual health for adolescent girls. Over the course of just one year:

Community Engagement

50,000+

People Engaged by Hans Sakhis

2,500+

Community meetings and health education programmes engaged 4,000 participants and 2,950 adolescent girls

Data Source: MMU Project Monitoring Dashboard (till September 2024)

Patients Reached

1,900+
Health Camps

70,952
Outpatient Sessions

32,794
Patients

69%
Women Patients

400+
Home Visits for the elderly and people with disabilities

900
Patients provided with glasses

This initiative has effectively expanded healthcare access, with a particular focus on women's health, specialised care for vulnerable groups, and robust community outreach. It's a powerful reminder that real change is possible when you take healthcare to where it's needed the most.

Bringing Hope, Health, and Dignity

The impact of MMUs on communities is profound. By treating illnesses, educating people and building awareness, these units are creating healthier, more informed communities. The transformation is visible in numbers, but even more so in the stories of people whose lives have changed for the better.

Building a Stronger MMU Programme

Recommendations for the Future

The Mobile Medical Unit (MMU) programme has become a game-changer for healthcare in underserved areas of India. With its rapid growth and impressive reach, the initiative has shown just how scalable and effective it can be. But as the programme evolves, there's always room to make it better. Whether it's about streamlining operations, boosting community engagement, or ensuring long-term sustainability, the future of the MMU programme depends on its ability to adapt, innovate, and address the diverse healthcare needs of the communities it serves.

Here are some key recommendations we derived from our robust M&E framework to ensure the programme continues to deliver quality healthcare where it's needed the most:

Enhancing Operational Efficiency and Route Planning

To get the most out of every unit, optimising the routes and schedules of MMUs is essential. Using data-driven scheduling and routing algorithms can help reduce travel times and maximise the hours spent serving communities. Regular operational assessments can pinpoint bottlenecks and ensure that interventions are targeted, efficient, and effective.

Deepening Community Engagement and Outreach

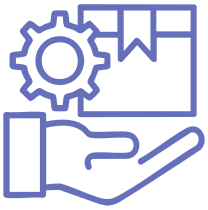
Every community is different. To increase the impact of the MMU programme, outreach efforts should be tailored to the unique cultural and social contexts of each region. Collaborating with local leaders, influencers, and community based organisations can create a deeper connection and drive greater participation in MMU services, especially in areas where attendance at outpatient sessions is low.

Maintaining Vehicle Cleanliness and Hygiene

Keeping the MMUs clean and sanitary isn't just about meeting standards—it's about creating a welcoming environment for patients. Strengthening fumigation and maintenance protocols, along with regular training for staff, will ensure that hygiene is prioritising, and vehicles remain a safe space for all.

Upholding Vehicle Safety and Maintenance Standards

Safety should always come first. Regular safety audits and equipment checks are a must to identify and address any deficiencies, ensuring that MMU vehicles meet all safety standards. Staff training in vehicle and equipment maintenance can also empower teams to handle any technical issues that arise, maintaining the reliability of services.



Ensuring Consistent Service Package Delivery

One of the strengths of the MMU programme is its standardised service package. Regular monitoring and adherence audits are necessary to maintain consistency across all units. This way, patients can expect the same quality of care regardless of where they're located.

Implementing Robust Biomedical Waste Management

Disposing of biomedical waste safely and responsibly is critical for patient and community health. Establishing stringent waste disposal protocols and training staff on proper techniques will help ensure that the environment stays clean and safe, especially in states with lower compliance.

Improving Logistics and Supply Chain Management

No healthcare service can function effectively without a steady supply of medicines and equipment. Developing a strong inventory management system and strengthening supply chain processes will prevent stockouts, ensuring that MMUs can operate without disruptions and always have the resources they need.

Standardising Record-Keeping and Data Management

Accurate records are the backbone of any healthcare initiative. By adopting digital systems for patient records and stock management, the MMU programme can enhance efficiency, reduce errors, and better forecast demand for supplies.

Addressing Regional Disparities and Coordination

Healthcare needs can vary widely from region to region. By identifying and addressing these regional disparities, the MMU programme can tailor interventions to meet specific needs. Establishing formal referral pathways and follow-up mechanisms will ensure that patients receive continuous care even after MMU visits.

Fostering Continuous Evaluation and Service Improvement

The MMU programme should keep evolving. Continuous evaluation using data and regular feedback from beneficiaries and stakeholders can help identify areas for improvement and drive ongoing service enhancement. Creating channels for open communication will make sure that the programme remains responsive and adaptive.

Looking Ahead

Building a Sustainable Future for the MMU Programme

The key to the effectiveness of The Hans Foundation's Mobile Medical Unit (MMU) programme is its capacity to adjust, create new solutions, and meet the constantly evolving healthcare requirements of rural and underserved populations. The MMUs have not just offered important medical services, but also changed the landscape of rural healthcare delivery by taking healthcare right to the doorsteps of those in need.

From its beginnings, the MMU initiative has expanded from a few vehicles to a large system of 514 units spread out in ten states, impacting more than 3.9 million individuals in 12,289 villages. The effects of the programme are evident in the decreased expenses of healthcare, enhanced results of health, and expanded availability of top-notch medical services. However, apart from the numbers, the real effectiveness of the MMU initiative can be seen in the individual anecdotes of people whose lives have been transformed—such as Rekha Devi, who controlled her diabetes and regained her vitality to launch a small enterprise, or Shyam Lal, who conquered a long-term ailment and enhanced his economic status.

However, this voyage is not finished yet. The results and evaluations in this report highlight the importance of ongoing enhancement and specific tactics to tackle regional differences and operational obstacles. Suggestions like improving route planning, increasing community involvement, and upholding vehicle and service standards are essential for ensuring the programme's continued success and growth.

While focusing on the future, the MMU initiative aims to address wider health concerns such as maternal and mental health, and to prioritise preventative care via health education and awareness efforts. The MMU programme's flexible and expandable structure can be used as a model not only for other areas in India, but also for similar projects globally.
The road ahead includes expanding community partnerships, using data for decision-making, and meeting the healthcare needs of all in the programme. By accepting these chances and difficulties, the MMU programme can keep changing rural healthcare, ensuring quality healthcare for all, regardless of their location.

The Hans Foundation is dedicated to reducing healthcare disparities and fostering healthier, more resilient communities through the Mobile Medical Unit programme. Working hand in hand, we can guarantee that everyone has access to quality healthcare, leading to a healthier and equitable future for everyone.

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