HISWG

ETHNIC DEMOGRAPHIC AND HEALTH SURVEY (EDHS) 2024

Health, Displacement, and Service Delivery in Conflict-Affected Burma

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MESSAGE FROM DR. CYNTHIA MAUNG

We present the findings of the 2024 Ethnic Demographic and Health Survey (EDHS) at a time of significant disruption in Burma. Since the events of February 2021, widespread instability has severely strained the country's health sector, setting back even the modest gains achieved over the past decade.

Communities that already faced limited access to essential services now confront even greater barriers to healthcare, education, and personal security. In many regions, earlier improvements through collaboration between ethnic health systems and national structures have been disrupted.

Despite these setbacks, communities continue to demonstrate remarkable resilience, drawing on decades of experience in navigating adversity. Ethnic and community-based health organizations continue to play a vital role in delivering essential services, particularly in remote and hard-to-reach areas. Often operating in challenging environments, these organizations remain a key source of healthcare for some of the most underserved populations in Burma.

These are not temporary or reactive structures that emerged in response to recent disruptions in the central health system. Rather, they are long-standing institutions, developed from within communities themselves. Guided by principles of bottom-up federalism, these ethnic health actors serve as foundational building blocks for locally governed health systems. As their responsibilities and areas of operation grow, so too does their role in shaping sustainable, community-led health responses.

More than service providers, they are trusted, embed ded institutions an enduring presence in the lives of the communities they serve.

This report is more than a collection of data points it reflects the quiet persistence of local health systems operating in challenging environments. Yet, the 2024 EDHS demonstrates that these systems have not collapsed they have adapted. They continue to carry out surveillance, deliver care, and respond to community needs, even under severe constraints.

We share these findings with a renewed call to humanitarian and development actors to recognize and support locally rooted systems. Ethnic and community-based health providers continue to serve populations that are often beyond the reach of international actors. Strengthening these systems requires more than funding it requires trust, long-term investment, and partnership with institutions that have deep roots in their communities and have remained active through crisis and recovery.

To all those who contributed to this survey health workers, surveyors, and partner organizations we offer our heartfelt thanks. Your dedication made this work possible. Your commitment is both recognized and deeply appreciated.

To our supporters: thank you for your continued partnership. May we move forward together toward a future where health is guided not by circumstance, but by shared responsibility, equity, and trust.

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Back Pack Health Worker Team (BPHWT)

Burma Medical Association (BMA)

Civil Health Development Network (CHDN)

Karen Department of Health and Welfare (KDHW)

Kachin Women Association Thailand (KWAT)

Mon National Health Committee (MNHC)

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ACRONYMS AND ABBREVIATIONS

ANC	-	Antenatal Care
ASEAN	-	Association of Southeast Asia Nations
BMA	-	Burma Medical Association
BP	-	Blood Pressure
BPHWT	-	Back Pack Health Worker Team
CBO	-	Community-Based Organisation
CDM	-	Civil Disobedience Movement
CHDN	-	Civil Health and Development Network
CMR	-	Crude Mortality Rate
COVID-19	-	Coronavirus Disease 2019
CSO	-	Civil society organization
EBRMS	-	Eastern Burma Retrospective and Mortality Survey
ECBHO	-	Ethnic and Community-based Health Organization
EDHS	-	Ethnic Demographic and Health Survey
EHO	-	Ethnic Health Organization
EHSSG	-	Ethnic Health Systems Strengthening Group
ERO	-	Ethnic Resistance Organization
GAM	-	Global acute malnutrition
GDP	-	Gross domestic product
HFIAS	-	Household Food Insecurity Access Scale
HISWG	-	Health Information System Working Group
IDP	-	Internally Displaced Persons
IEC	-	Interim Executive Council
IMR	-	Infant Mortality Rate
ITN	-	Insecticidal Treat Net
IUD	-	Intra-Uterine Device
KDHW	-	Karen Department of Health and Welfare
KHN	-	Kachin Health Network
KWAT	-	Kachin Women Association Thailand
MNHC	-	Mon Health National Committee
MTC	-	Mae Tao Clinic
MUAC	-	Mid Upper Arm Circumference
NCD	-	Non-communicable disease
NGO	-	Non-Governmental Organization
NUG	-	National Unity Government
PDF	-	People's Defence Forces
PHQ-9	-	Patient Health Questionnaire-9
PNC	-	Postnatal Care
SAC	-	State Administration Council
SFUH	-	Sagaing Federal Unit Hluttaw
SSDF	-	Shan State Development Foundation
U5MR	-	Under-5 Mortality Rate
UN	-	United Nations
WASH	-	Water, Sanitation and Hygiene
WHO	-	World Health Organization
WRA	-	Women of Reproductive Age

The 2024 Ethnic Demographic and Health Survey (EDHS) offers the most extensive, population-based assessment of health, well-being, and service access in Burma's ethnic and conflict-affected areas since the 2021 political crisis. Drawing on data from over 3,000 households and nearly 15,000 individuals across seven states and regions, the survey provides critical evidence on how communities are navigating compounding challenges rising health burdens, collapsing services, displacement, and deepening socioeconomic vulnerabilities.

Key Findings

1. A Dual Burden of Disease and Fragility

Ethnic communities face a convergence of longstanding health challenges and new risks. While infectious disease and malnutrition continue to affect children and women of reproductive age, the survey reveals rising prevalence of non-communicable diseases (NCDs), especially among women. Hypertension affects 37.4% of women and 33.3% of men, yet treatment adherence remains below 10.0%. Diabetes, mental health disorders, and disability are increasingly common, but services for diagnosis and care are limited or absent.

2.Worsening Service Access and Protection Gaps

Half of all women still give birth at home, and fewer than half receive any postnatal care. While most communities report physical proximity to a health facility, service functionality is highly inconsistent underscoring the fragile and fragmented state of the health system. Displaced populations and rural households face the most acute barriers to care, with intersecting vulnerabilities across gender, geography, and socioeconomic status.

3.Widespread Food and Livelihood Insecurity

40% of households experience moderate or severe food insecurity, with levels exceeding 70% in Shan (South) and Nay Pyi Taw. While most children and women appear nutritionally adequate based on MUAC measurements, localized vulnerabilities are evident. Livelihoods have been disrupted: 60% of households depend on agriculture, yet nearly half report income loss since the coup, compounding food insecurity and household stress.

4.The Shadow of Political Crisis

The coup's cascading effects are stark: 25% of households reported death or injury due to violence, and over 75% experience ongoing political stress. Migration is increasingly youth-led-two-thirds of migrants are under 25, many fleeing forced conscription. Mental health challenges are widespread, with 46% of adults showing depressive symptoms, particularly in Karenni, Shan (South), and Nay Pyi Taw.

5.Local Resilience Amid Fragility

Despite systemic challenges, communities are respon ding with resilience. Long-established ethnic and community-based organizations (EHOs, ECBHOs, CSOs) remain the frontline responders in most surveyed areas. Where these actors are strong, service access and outcomes tend to be more stable highlighting the importance of local leadership, coordination, and trust-based programming.

Strategic Implications

- Equity and Inclusion Must Be Central: Disparities in access and outcomes are stark, with the poorest and most remote communities left furthest behind. Addressing these inequities requires conflict-sensitive, gender-responsive, and geographically targeted interventions.
- Support Community Led Health Systems: Ethnic and community based providers are sustaining critical services amidst extreme constraints. Strengthening their capacity, infrastructure, and coordination mechanisms is essential to meet rising needs.
- Mental Health and Social Protection Are Urgent Gaps: The psychological and economic toll of conflict demands urgent investment in mental health care, disability support, and livelihood recovery.
- Aid Must Be Nimble and Locally Anchored: Humanitarian and development programming must move beyond centralized models. Flexible, cross-border and community-embedded approaches are vital for reaching populations in crisis.

Conclusion

The EDHS 2024 findings are a call to action. Burma's ethnic areas are navigating a perfect storm of health, economic, political and environmental shocks. Yet amidst these challenges, communities continue to adapt and respond. By centering equity, reinforcing community systems, and aligning aid with local realities, there remains a window to protect hard-won health gains and build more resilient, inclusive systems for the future.

CHAPTER 1 BACKGROUND

Burma (also known as Myanmar) is mainland Southeast Asia's largest country, sharing borders with China, Laos, Thailand, Bangladesh, and India. The 2014 national census reported a population of approximately 51.5 million. Although the country is named after the largest ethnic group in the country, the Bamar (or Burmans), it is also one of the most ethnically diverse countries in the world, with non-Bamar ethnic peoples constitute over one-third of the total population. Despite this diversity, the state has long privileged the majority Bamar population through a process of national homogenization manifesting through suppression of education of ethnic languages, marginalization of non-Buddhist religions, and centralized political structures, including in health administration. As Callahan (2003) outlines, these policies were most explicitly institutionalized during the Ne Win military regime (1962-1988), but they have continued in various forms under both military and quasi-civilian administrations.[1]

The rise and persistence of Ethnic Armed Organizations (EAOs) can be traced to these historical grievances, as marginalized communities sought greater autonomy, recognition, and equitable development in the face of state exclusion and militarization and since independence, Burma has never been without civil conflict.

As a result of decades of protracted conflict and overlapping governance by state and non-state actors, along with longstanding neglect of health by successive central administrations, particularly in conflict zones and non-Burman communities, many of the most vulnerable populations of the country remain with no or very limited access to basic healthcare and humanitarian services.

Note on Terminology : In this report, we use Burma rather than Myanmar in recognition of the political context and preferences of many of the communities and civil society groups with whom we work. Burma is widely used by pro-democracy movements, ethnic organizations, and community based networks who view the name Myanmar officially adopted by the military regime in 1989 as lacking legitimacy. Our choice of terminology reflects solidarity with these groups and the values of inclusion, justice, and self-determination.

1.1 Post-2011 Health System Evolution in Burma: Centralization, Conflict, and Crisis

Over the past decade, Burma's health system has been shaped - and increasingly strained-by a convergence of political transition, protracted conflict, public health emergencies, and climate-related disasters. Despite early reform efforts and greater international engagement after 2011, structural weaknesses persisted, particularly the system's over-centralization and limited responsiveness to local needs. Authority over policy, financing, workforce deployment, and data systems is concentrated in the national capital, Nay Pyi Taw, with subnational (region and state-level) and ethnic governments having minimal influence over health planning or budgeting. This top-down model does not reflect Burma's geographic, cultural, and epidemiological diversity, leaving many communities especially those in border areas and conflict zones - with under-resourced and inaccessible care. Years of exclusion have contributed to low trust in government health services, and in many regions, ethnic health organizations (EHOs), ethnic community-based health organizations (ECBHOs), and civil society organizations (CSOs) have stepped in to fill critical gaps. These local providers deliver essential care - including primary healthcare services, maternal and child health services, disease surveillance, health education, and emergency response - using culturally appropriate methods and communicating in local languages.

The COVID-19 pandemic and the 2021 military coup further destabilized the already underfunded health system. Burma allocated just 4.8% of GDP to health in 2018, the lowest among ASEAN countries, and the health system was unprepared for pandemic response. COVID-19 magnified existing inequalities, particularly in areas with limited or no state health presence. After the coup, mass resignations of government health workers under the Civil Disobedience Movement,[2] the militarization of hospitals, and heightened insecurity caused the collapse of services in many regions. With over three million internally displaced persons (IDP) by 2024 and disruptions to routine programs such as immunization and tuberculosis control, the burden of care fell even more heavily on local health actors.

Despite severe constraints - including funding shortages and disrupted supply chains EHOs and ECBHOs maintained service delivery through mobile clinics, maternal health outreach, and trauma care in conflict zones. These community-rooted systems have become essential for displaced populations far beyond the reach of formal health services providing care inside the country, as well as referrals to Thailand.

In late 2024, severe flooding across southeastern Burma exacerbated by Typhoon Yagi and intensified monsoon rains-further exposed the fragility of the country's health infrastructure. Over one million people were affected across more than 65 townships, with hundreds killed or missing. The floods destroyed roads, bridges, and critical health infrastructure while also triggering outbreaks of waterborne diseases, particularly in IDP camps. EHOs and ECBHOs, already stretched thin, were once again the first responders. Layered on top of ongoing armed conflict, and a disrupted public health system, such recurring climate shocks underscore the urgent need to address the structural limitations of Burma's health sector. It will require a shift away from centralized governance and toward inclusive models that formally recognize, support, and integrate the local health providers who continue to deliver essential care where government systems cannot. In many parts of the country, these community-led providers are not an alternative-they are the health system.

Frontline health providers in ethnic areas

Ethnic Health Organizations (EHOs) are health departments or medical wings established by Ethnic Armed Organizations (EAOs) to deliver healthcare services in territories under their control or influence. They are typically structured entities with defined leadership, technical staff, and service delivery networks, and are considered the de facto health authorities in many conflict-affected ethnic areas of Burma

Ethnic Community-Based Health Organizations (ECBHOs) are non-state, community-rooted health organizations that operate independently or in coordination with EHOs. They are often based along border regions or in displacement-affected communities. ECBHOs frequently serve populations in areas not reached by either state or EHO systems and are critical actors in humanitarian response and health system resilience.

Civil Society Organizations (CSOs) in ethnic areas are community-based, non-governmental groups that respond to local needs where state services are limited. They work closely with local EHOs, community-based organizations (CBOs), and other networks to respond the urgent needs of health, education, and humanitarian services; support peacebuilding and conflict resolution; preserve culture and promote local governance; document human rights violations; and mobilize communities for political participation and self-determination.

1.2 Post-2021 Health in Transition: Emerging Governance and Local Health Leadership

Since the 2021 military coup, Burma's governance landscape has undergone fundamental changes, particularly in areas most affected by conflict and displacement. As central state systems have withdrawn from large areas of the country, new administrative structures have emerged to fill the vacuum.
Local and ethnic governing bodies-including Karenni State's Interim Executive Council (IEC), the Sagaing Federal Unit Hluttaw (SFUH), and various township-level coordination teams have increasingly assumed responsibility for core functions such as public administration, education, and health service delivery.

Some of these structures operate with the support and coordination of the National Unity Government (NUG), which seeks to guide and harmonize interim governance across multiple regions.

These emerging authorities are not ad hoc actors. The Karenni IEC, for instance, has developed a formalized administrative system with distinct departments responsible for health, finance, trade, agriculture, and infrastructure. Its health department collaborates with ethnic health organizations and civil society partners to deliver care, manage referrals, and support mobile health outreach in hard-to-reach areas. In parallel, the SFUH in Sagaing Region has worked closely with the NUG's Federal and State Coordination Committee to draft a subnational constitution and operationalize local governance through community consultations and interim public administration bodies.

These efforts reflect an important shift: in the absence of formal state services, local populations are increasingly turning to these interim governance bodies as legitimate providers of health and social services. Community trust, shaped by proximity, cultural alignment, and accountability, has become a defining feature of these authorities. For example, in Karenni State and Sagaing Region, public engagement in health consultations and local governance forums is growing, reinforcing the role of these bodies as both service providers and coordinators of local health responses.

This shift toward decentralized health governance holds important implications. First, it enables a more tailored and context-sensitive approach to health service delivery-one that aligns with local needs, languages, and realities on the ground. Second, it strengthens accountability, as health authorities are increasingly embedded within and answerable to the communities they serve. Third, it creates space for more resilient, distributed data systems, which are crucial for planning, outbreak monitoring, and equitable resource allocation in conflict-affected and underserved regions.

Recognizing and supporting these emerging actors is not simply a response to crisis it is an investment in long-term health system resilience. As Burma navigates a period of uncertainty and transformation, engaging constructively with decentralized governance structures-particularly those rooted in community legitimacy and active service provision will be key to sustaining health access, rebuilding systems, and ensuring that future health strategies are inclusive, accountable, and responsive to the country's diverse populations.

Examples of emerging governance structures

Interim Executive Council (IEC), Karenni State: Formed by representatives of Karenni civil society, resistance forces, and ethnic organizations, the IEC functions as an interim governing body in Karenni State. It oversees local administration and public services, and has launched sectoral plans such as a one-year economic development strategy. The KIEC operates in areas no longer served by central authorities and is recognized by local communities as a legitimate governance body.

Sagaing Federal Unit Hluttaw (SFUH): The SFUH consists of lawmakers elected in 2020 from Sagaing Region who continue to operate in opposition to the military regime. Working closely with local resistance and civil society groups, it leads efforts to establish interim governance, including the drafting of a subnational constitution and coordination of public services in contested areas. The SFUH works alongside the NUG to strengthen administrative functions and uphold democratic mandates in Sagaing.

National Unity Government (NUG): Established in April 2021 by elected parliamentarians, ethnic leaders, and pro-democracy groups, the NUG presents itself as the legitimate interim government of Burma. It coordinates political, military, and humanitarian efforts across opposition-held territories and works toward a federal democratic future. The NUG supports the development of state-level administrations, including the KIEC and SFUH, through its Federal and State Coordination Committee (FSCC).

1.3 Health Information System Working Group (HISWG)

Since its establishment in 2004, the Health Information System Working Group (HISWG) has served as a vital consortium of EHOs and ECBHOs, working to fill critical data gaps in Burma's conflict-affected and ERO-governed areas. In regions often excluded from national health surveillance systems, HISWG has led some of the only systematic efforts to generate population-based data on health outcomes, mortality, and the health impacts of conflict and human rights violations.

1.4 Significance of this Report

The 2024 EDHS survey builds on four earlier rounds of morbidity and mortality data collection conducted in 2004[3], 2008[4], 2013[5], and 2019[6]. These surveys have provided essential data not only for service delivery and advocacy, but also for understanding long-term health trends in communities that remain underrepresented in official health statistics. This ongoing, collective effort over the past 20 years reflects a deep commitment to amplify community voices and ensure that health systems planning is grounded in the lived realities of populations.

In recognition of the expanded scope and the formal collaboration among 13 EHOs and ECBHOs under the Ethnic Health Systems Strengthening Group (EHSSG), the survey was renamed the EDHS to reflect a more inclusive and systems-focused approach. The 2024 EDHS captures data across a broad range of domains including morbidity, mortality, reproductive and child health, nutrition, migration, access to healthcare, and human rights. A new section was also introduced to assess community resilience, featuring surveys with three to six community leaders in each cluster. These interviews explore local governance, access to schools and health, and responses to ongoing conflict and displacement, adding depth and context to the household survey findings.

In the wake of Burma's political and humanitarian collapse following the 2021 military coup, the 2024 EDHS provides a crucial baseline for understanding health systems in a rapidly changing context. It offers population-level evidence on health conditions, vulnerabilities, and community response capacity particularly in conflict-affected and displaced areas where international actors have limited access. The survey reflects coordination not only with EHOs and ECBHOs, but also with emerging interim governance structures recognized locally as health authorities. This shift underscores a move toward localized, community-led health planning and data systems, offering key insights for donors and humanitarian actors seeking to support inclusive, resilient approaches grounded in local realities.

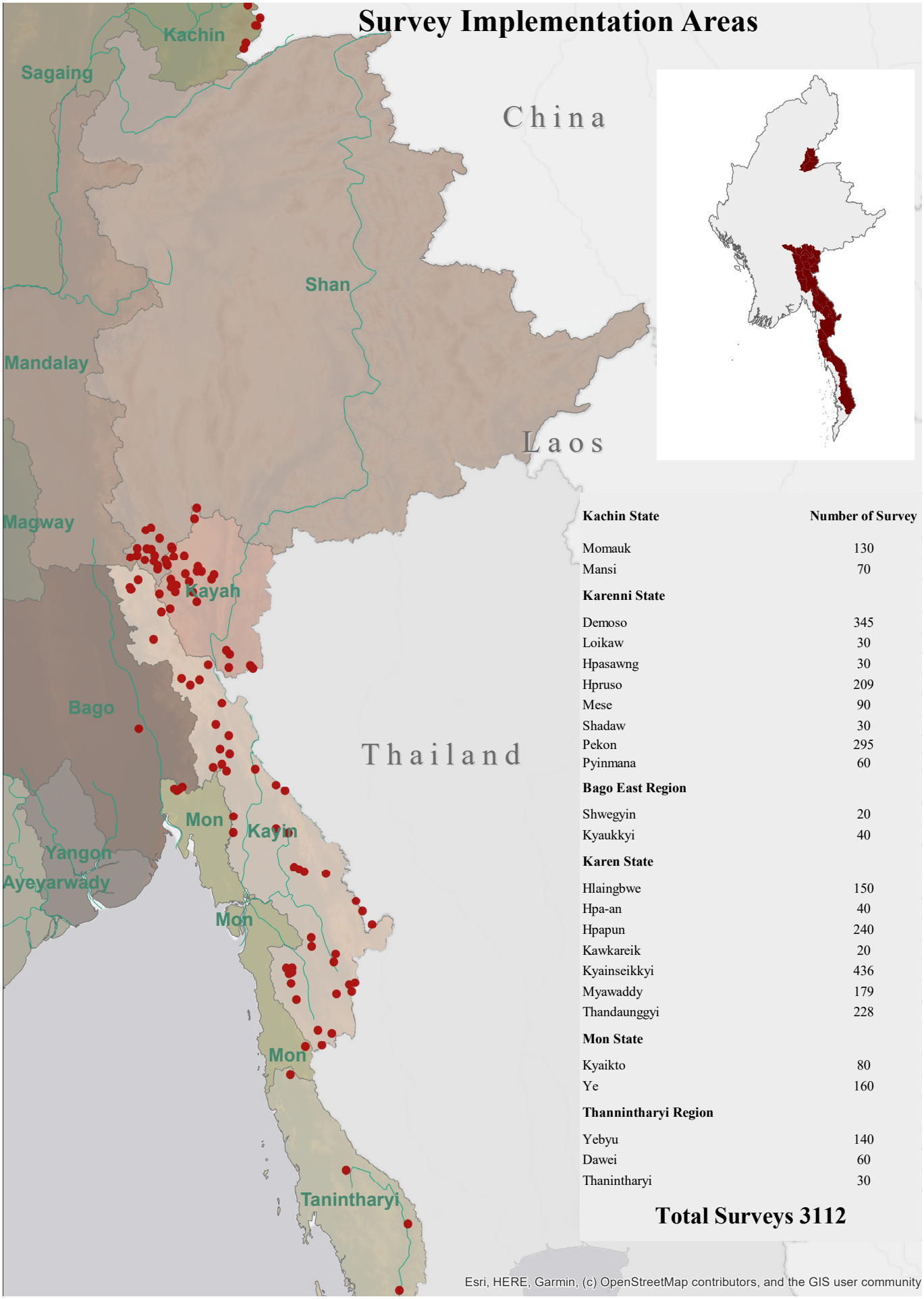

Figure 1. Survey implementation areas

CHAPTER 2 METHODOLOGY

The EDHS, formerly known as the Eastern Burma Retrospective Morbidity Survey (EBRMS), is a population-based household survey conducted to assess health status, access to health services, and key social determinants of health among communities served by EHOs and ECBHOs in conflict-affected regions of Burma. Initiated in 2004, large-scale rounds were subsequently conducted in 2008, 2013, and 2019. The 2024 round builds on the 2019 methodology while adapting to rapidly evolving shifts in the security landscape and displacement.

The study protocol underwent ethical review and approval by Queen's University's Health Sciences and Affiliated Teaching Hospitals Research Ethics Board. All participants provided informed verbal consent, and participation was voluntary.

2.1 Sampling design and field implementation

The 2024 survey employed a stratified, two-stage cluster sampling design, using disaggregated sampling frames aligned with the service areas of EHOs and ECBHOs. Surveys were initially planned across both camp and non-camp settings in Mon, Karen, Karenni, Shan, and Kachin States. Due to escalating conflict in Kachin State, eight of the ten selected non-camp villages were deemed inaccessible. As a result, the survey team redirected efforts exclusively toward accessible IDP camps in Kachin.

EDHS Survey Implementation Steps:

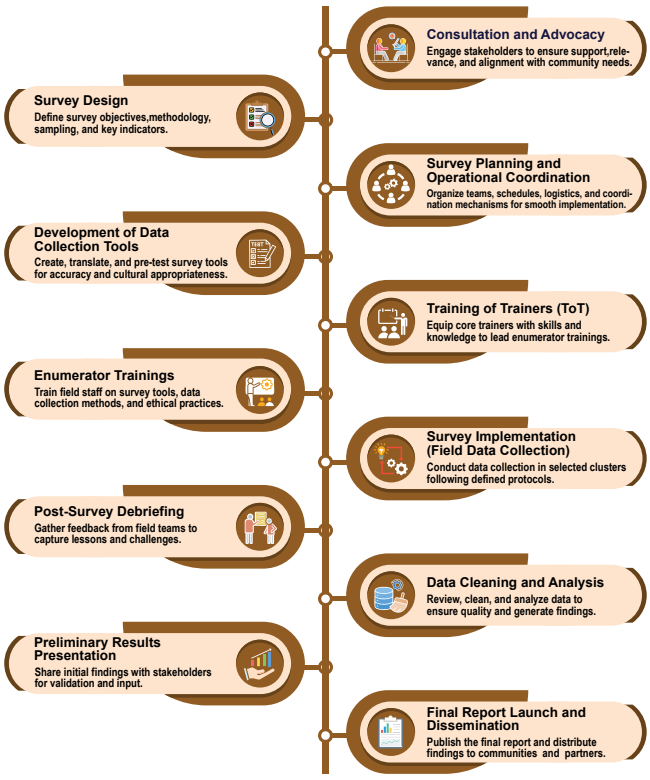

Figure 2. Steps of the survey implementation process

Cluster selection was based on probability proportional to size within each EHO/ECBHO service area. Within each selected cluster, 15 to 30 households were sampled using proximity-based methods. A household was defined as individuals living under one roof and sharing meals for at least two months. Where clusters contained too few households, adjacent villages were merged to meet the required sample size. In cases of an empty or abandoned cluster (e.g., closed IDP camps), the next nearest accessible site was selected as a replacement.

Participating organizations included: BPHWT, BMA, CHDN, KDHW, KWAT and MNHC. Due to security constraints, the Kachin Health Network (KHN), Shan Health Department (SHD), and Shan State Development Foundation (SSDF) had to withdraw from the survey.

Key ethnic health actors involved in the EDHS

Ethnic Health Organizations (EHOs)

Civil Health and Development Network (CHDN): Established in 2012 by six ceasefire-signatory organizations (currently five organizations after the

2021 military coup) in Karenni State, CHDN is an EHO that delivers basic healthcare to 446 remote villages, 144 IDP camps and 149 IDP sites (total 739 sites) through 53 clinics, 3 secondary hospitals, and 1 Integrated Health Service Center (IHSC), trained community health workers, and mobile backpack teams, to expand access to essential services in hard-to-reach areas.

Karen Department of Health and Welfare (KDHW): Founded in 1965, KDHW is an EHO providing comprehensive, community-based primary healthcare to over 450,000 people in remote and conflict-affected areas of Karen State and parts of Mon State, Tanintharyi, and East Bago, through a network of Village Tract Health Centers and Village Health Workers.

Mon National Health Committee (MNHC): MNHC is a non-profit founded in 1992 that provides primary healthcare to approximately 60,000 internally displaced persons along the Thailand-Burma border and in parts of Mon, Karen, and Tanintharyi, operating clinics and serving around 10,000 people through its facilities and outreach.

Ethnic Community Based Health Organizations (ECBHOs)

Back Pack Health Worker Team (BPHWT): Founded in 1998 by health workers from Karen, Karenni, and Mon States, BPHWT is a community-based organization that delivers primary healthcare, maternal and child health, and health education to over 300,000 internally displaced and vulnerable people across conflict-affected areas in Burma, through mobile teams and a community-managed, participatory approach.

Burma Medical Association (BMA): Formed in 1991 at Manerplaw in Karen State, BMA is a leading health body that brings together border-based medical professionals to strengthen healthcare delivery, promote public health policy, and build capacity in ethnic areas of Burma through close collaboration with ethnic health organizations, civil society, and national and international partners.

Kachin Women's Association Thailand (KWAT): KWAT is a non-profit organization working to eliminate discrimination and violence against women, improve their living standards, promote their participation in decision-making, and advance social justice, peace, and development in the Kachin region, guided by a vision of a peaceful, equitable society.

Other ethnic health actors that had to withdraw their participation in the survey due to intense armed conflict and Cyclone Yagi during the survey period.

Kachin Health Network (KHN): Established in 2020, KHN is an EHO working across 12 townships in Kachin State to provide basic health services to indigenous populations, migrant workers, persons with disabilities, and other vulnerable groups in remote areas, through partnerships with local CSOs and EHOs.

Shan Health Department (SHD): Founded in 2019 by six Shan EHOs, SHD delivers accessible primary healthcare across more than 20 townships in Shan State through over 30 clinics, serving over 200,000 predominantly rural residents, with a mission to strengthen public health and contribute to a federal health system through community-driven, inclusive approaches.

Shan State Development Foundation (SSDF): Founded in 2012 through the unification of key Shan committees, SSDF supports displaced and disadvantaged Shan communities along the Thailand–Shan border and within Shan State by providing emergency relief, healthcare, education, and community development services to help fulfill basic needs and improve livelihoods.

2.2 Training of surveyors

A hybrid Training-of-Trainers session was conducted from August 19-23, 2024, with two in-person participants nominated from each participating EHO and ECBHO. Only those attending in person were formally designated as survey trainers.

Following the Training-of-Trainer sessions, these designated trainers led five multiplier trainings for 48 surveyors across Burma and Thailand between September 30 and October 10, 2024. Training locations were selected based on accessibility and secu-

rity considerations, and included Mae Sot, Thailand and inside Karenni and Karen States, Burma.

The training curriculum covered core components of the 2024 survey, including stratified cluster sampling techniques, use of digital data collection tools, procedures for obtaining informed consent, interview protocols and ethical considerations, participant referral processes, and methods for measuring anthropometry and blood pressure.

Surveyors were also oriented on how to assess local conditions in the field, document any unexpected issues, and report any security-related incidents to the survey coordination team in real-time.

Figure 3. Training of surveyors in the field

2.3 Data collection

Data collection was conducted from October 14 to November 23, 2024. Surveyors visited households and administered questionnaires to the primary respondent - typically the male or female head of household. In instances where the head of household was unavailable, surveyors selected the most appropriate respondent, giving priority to women of reproductive age (WRA) with children under five.

The survey instrument was adapted from previous EBRMS rounds, with updates to capture emerging public health concerns including non-communicable diseases and conflict-related displacement. Questionnaires were translated into Burmese and other relevant local languages, reviewed by bilingual staff, and field-tested during enumerator training to ensure clarity and contextual accuracy.

In addition to interviews, surveyors conducted the following anthropometric measurements:

- Mid-upper arm circumference (MUAC): Assessed acute malnutrition in children aged 6–59 months and WRA (girls and women, aged 15 to 49 years).
- Blood pressure (BP): For selected adults aged 40–54 years and universally for those aged 55 years and above.

While most targeted clusters were successfully reached, some locations were found to be inaccessible or vacated due to population displacement or security threats. In such cases, surveyors filed incident reports with the central coordination team for documentation.

Figure 4. Surveyors crossing a river to reach a cluster for data collection

2.4 Data management and analysis

Data were entered, cleaned, and analyzed by members of the HISWG. Descriptive statistics were calculated and pooled across regions. At the time of reporting, data from the 2024 survey have not yet been adjusted for complex sampling design. This decision reflects both the operational urgency of producing timely findings and ongoing technical work to verify population denominators across partner areas. Given the rapidly evolving humanitarian context and immediate need for actionable insights, unweighted

results were prioritized to offer stakeholders a timely snapshot of community health status. While this approach may obscure regional disparities and limit generalizability, it still provides critical direction for planning and validates emergent concerns identified by frontline health providers.

2.5 Limitations

Several limitations should be considered when interpreting the findings of this survey.

First, due to access and security challenges, several selected clusters-particularly in parts of Kachin and Shan States-were not accessible and had to be excluded from the sample. As a result, populations in the most hard-to-reach or conflict-affected areas may be under-represented, and the findings may reflect relatively more stable locations.

Second, ongoing population movement and displacement disrupted data collection in several locations. In some instances, selected clusters (such as recently vacated IDP camps) had no eligible households available for survey, leading to substitutions or smaller-than-anticipated sample sizes.

Third, many indicators in the survey rely on a 12-month recall period, which may be subject to recall bias. This is particularly relevant in unstable or high-stress environments, where daily routines and memory may be disrupted. For some modules such as child illness and dietary intake-shorter recall periods (two weeks or 24 hours) were used to improve accuracy.

Finally, while data were pooled to provide an overall picture, the analysis did not apply statistical weights to adjust for the complex sampling structure. As such, findings represent unweighted estimates and may over- or under-represent certain groups or regions, limiting the precision of broader generalizations.

Despite these constraints, the survey offers important insights into populations that are often underrepresented in national datasets. It contributes to building an understanding of health trends in these communities, drawing from multiple survey rounds and ongoing local data collection efforts.

CHAPTER 3 COMMUNITY RESILIENCE

The 2024 EDHS Community Survey Module was implemented across 164 clusters, including 23 IDP camps and 141 non-camp village sites. This area covered 15,608 households, representing a population of 79,944 individuals comprising 4,348 households (20,340 people) in IDP camps and 11,260 households (59,604 people) in villages.

This section presents a comprehensive geographic and demographic profile of the surveyed clusters, highlighting their regional distribution, internal leadership structures, recent patterns of population change, distance from urban centers, and historic displacement and settlement patterns. These contextual insights are essential for interpreting how health, education, and development programs are delivered and experienced. Three key themes emerge:

• Service delivery is mediated by a shifting patchwork of EHOs, ECBHOs, and local authorities, creating uneven access to services across administrative, ethnic, and geopolitical contexts. The 2024 Community Module highlights where and how these gaps manifest on the ground.

• By collecting information on health, education, infrastructure, connectivity, housing, transport, and markets, the module provides a holistic picture of overlapping vulnerabilities. This cross-cutting lens enables more coordinated, context-sensitive planning across camp and non-camp settings.

• Survey coverage reflects a "best-case" scenario, and highly insecure or remote populations remain underrepresented. Actual displacement and service needs are likely higher than reported, underscoring the importance of cautious interpretation and complementary data-gathering efforts.

3.1 Clusters by Region

Surveyed clusters were heavily concentrated in Karen and Karenni States, which together accounted for 110 out of 164 (67.1%) clusters. Data were collected from both camp and non-camp settings in Karen and Karenni States. Shan (South), Mon, Tanintharyi, Nay Pyi Taw,* and Bago (East) sites had fewer clusters overall and no recorded camps, suggesting more dispersed or integrated populations or variations in how displacement is managed or documented. Only camp-based clusters were surveyed in Kachin State due to security constraints.

* *In this survey, clusters in Nay Pyi Taw Union Territory represent primarily Kayan areas of Pyinmana township.*

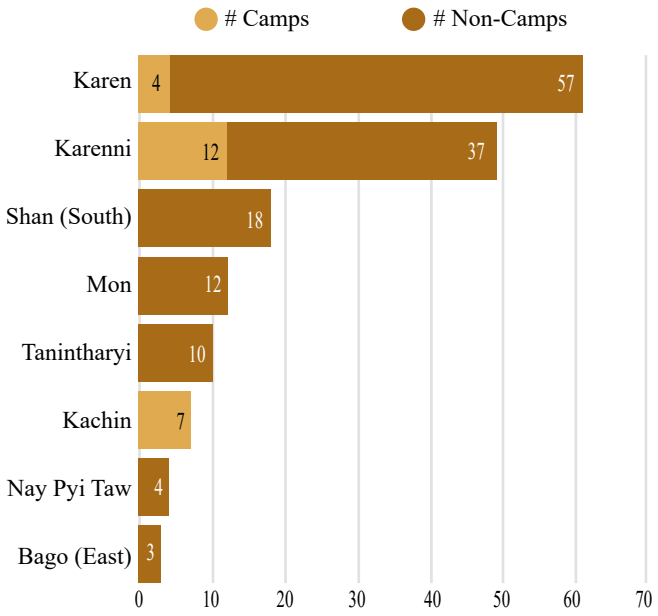

Figure 5. Number of clusters by surveyed areas

3.2 Profile of participants in the community ressilience module

Respondents for the community resilience module of the 2024 EDHS included a range of local leaders and service providers, with village heads, religious leaders, committee members, school teachers and clinic-in-charges making up over 90% of respondents. Community representatives from grassroots groups-particularly women's groups, youth groups, and informal volunteers-made up 7.0% of respondents.

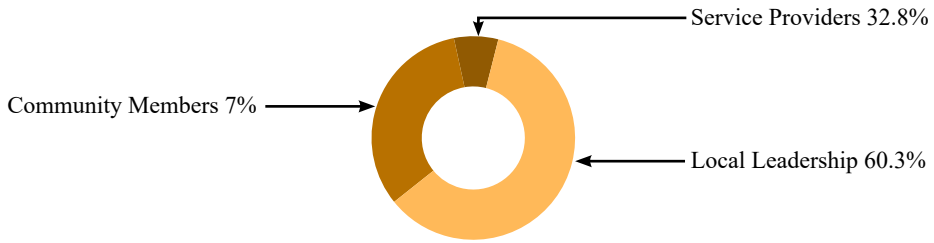

Figure 6. Types of participants in the community resilience module of the 2024 EDHS

3.3 Population Change Trends

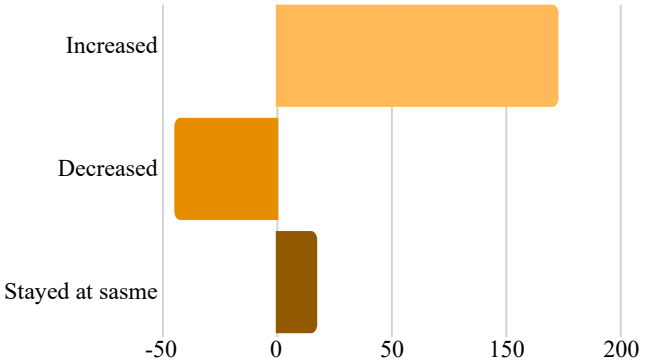

Figure 7. Population changes in the surveyed clusters since 2021

About two-thirds (n=109) of clusters reported population increases, likely driven by displacement into the surveyed sites, which reflects that they were relatively more secure areas. About one in four clusters (n=40) experienced population decline, likely due to out-migration linked to conflict, insecurity, economic pressures, or environmental stress. These trends suggest that displacement is influencing both population growth and decline, with movement patterns closely tied to perceived or actual safety in EHO/ECBHO service areas. Less than 10% of clusters (n=15) reported stable population levels.

3.4 Year of cluster establishment

Settlement patterns reveal distinct timelines for camp and non-camp clusters. Most non-camp clusters (n=93) were established before 1970, reflecting long-standing communities with deep historical roots, some of which may have transitioned from earlier rounds of displacement. In contrast, 87% of camp clusters (n=20) were established after 2000, indicating that camps are largely a result of more recent displacement events linked to ongoing and widening conflict, environmental crises, or forced relocation. These newer sites are likely still in transition and require more intensive support and stabilization efforts. 17 clusters reported that they were established after the 2021 military coup.

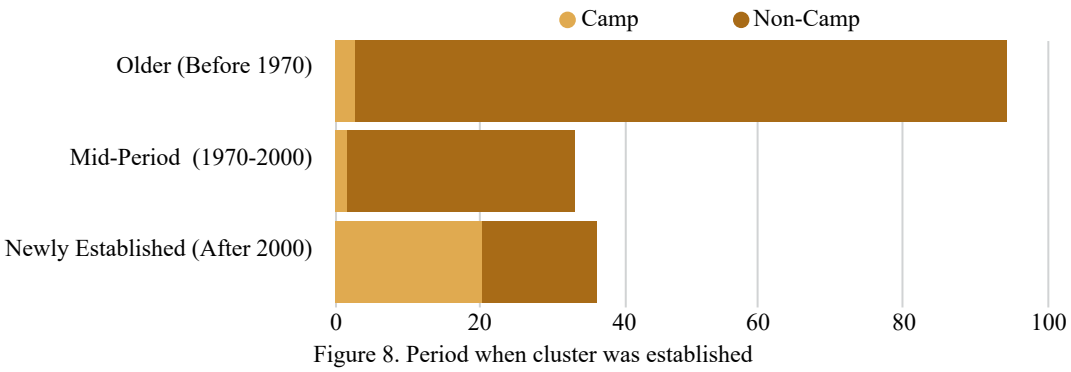

Figure 8. Period when cluster was established

3.5 Access to Programmes and Activities by surveyed areas

Access to humanitarian and development programs is uneven across Burma's regions. EHOs serve as key anchors for programming in areas where they hold local legitimacy and operational presence, particularly in Karenni and Karen States. CBOs and CSOs play a vital role in service delivery, especially in underserved or politically sensitive areas where international or state actors are absent. The involvement of the United Nations (UN) and non-governmental organizations (NGO) is concentrated in a few regions-notably Karen and Karenni States-while engagement remains minimal in Mon, Tanintharyi, and Bago (East), signaling potential blind spots in formal humanitarian coverage. These dynamics underscore the importance of locally embedded partnerships and area-specific coordination to ensure equitable and context-sensitive service delivery.

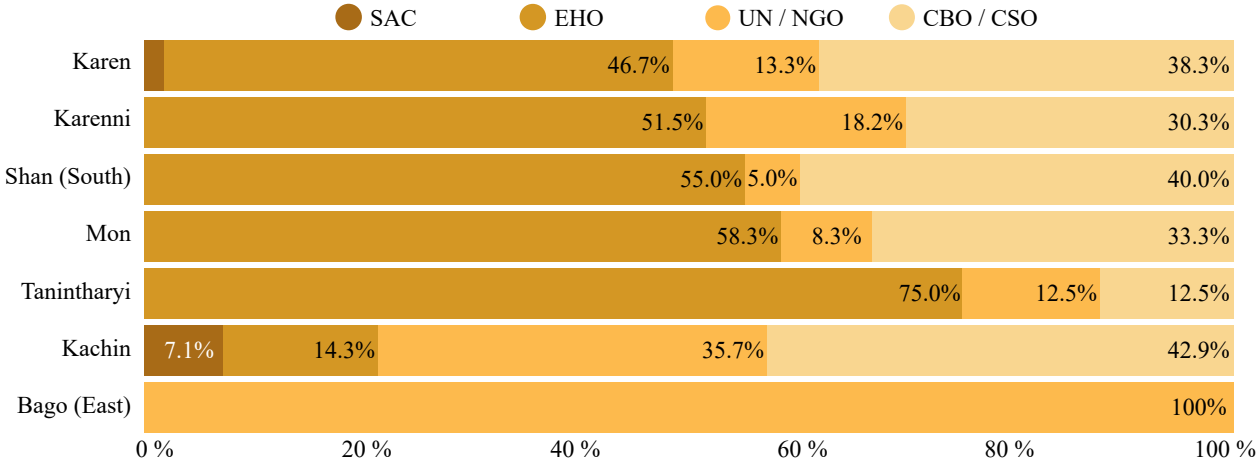

Figure 9. Access to programs by surveyed areas

3.6 Types of Security

Across the 164 surveyed clusters, most clusters fell under the control of Ethnic Resistance Organizations (EROs) (66.5%), followed by local militias (25.0%) and People's Defense Forces (PDFs) (4.3%). A few clusters reported no clear authority (3.0%) or declined to answer (1.2%). 16 of the 164 clusters reported the presence of multiple local authorities. No areas reported the SAC as a local authority. The absence of SAC control creates both opportunities for community- and ERO-led governance, where multiple security actors overlap or compete for influence. These dynamics underscore the need for flexible, conflict-sensitive programming that is attuned to shifting power structures and rooted in local trust-building and negotiation.

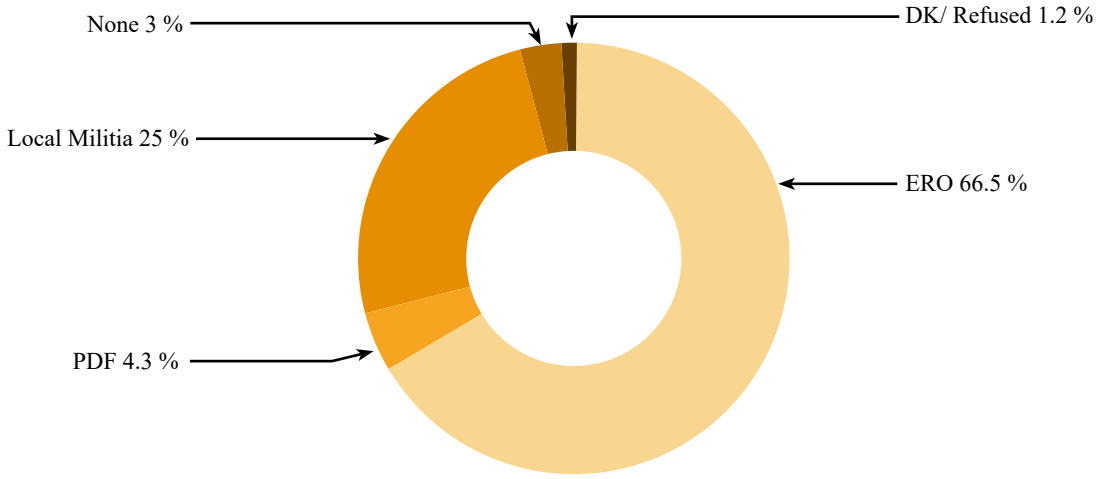

Figure 10. Types of security

3.7 Types of Village Committees

Data on village committees highlights a strong foundation of community-based governance in Burma, with the most common structures Village Administrative Committees and Education Committees, followed by Youth Committees and Women's Committees reflecting a focus on local governance, education, and social mobilization. These well-established networks demonstrate a high level of social organization and offer valuable entry points for locally led participatory programming. However, there is clear potential to expand their roles in areas critical to community resilience. Committees for Disaster Preparedness, Conflict Resolution, and Water and Sanitation remain underrepresented, underscoring the need for targeted support and investment to strengthen local capacities in addressing conflict, displacement, and climate-related challenges.

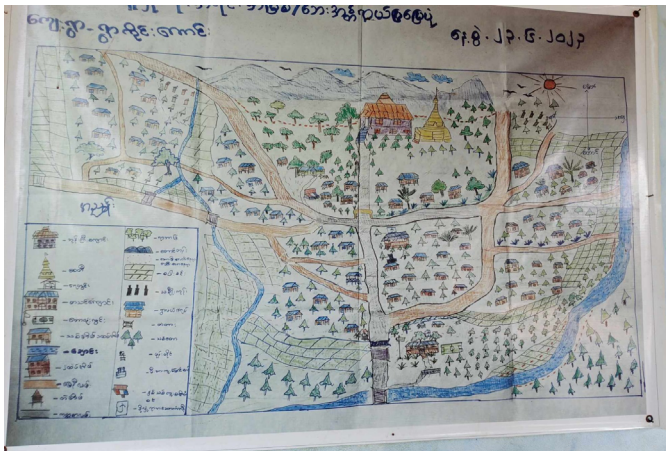

Figure 11. Community-led mapping for disaster risk reduction and management

	Village Development Committee	Village Administrative Committee	Village/ Tract Health Committee	Education Committee	Conflict Resolution Committee	Water and Sanitation Committee	Women's Committee	Youth Committee	Disaster Preparedness & Response Committee
Karen	34.4%	91.8%	62.3%	91.8%	26.2%	32.8%	75.4%	63.9%	19.7%
Karenni	24.5%	100.0%	51.0%	81.6%	10.2%	42.9%	49.0%	75.5%	4.1%
Shan (South)	44.4%	100.0%	38.9%	100.0%	61.1%	72.2%	72.2%	100.0%	11.1%
Mon	41.7%	91.7%	66.7%	75.0%	0.0%	50.0%	83.3%	66.7%	8.3%
Tanintharyi	40.0%	80.0%	60.0%	80.0%	10.0%	50.0%	50.0%	50.0%	10.0%
Kachin	42.9%	100.0%	57.1%	57.1%	57.1%	85.7%	57.1%	71.4%	14.3%
Nay Pyi Taw	0.0%	75.0%	25.0%	100.0%	0.0%	75.0%	0.0%	50.0%	0.0%
Bago (East)	0.0%	33.3%	66.7%	100.0%	33.3%	33.3%	66.7%	66.7%	33.3%

Table 1. Types of village committee

3.7.1 Five Key Improvements that Made a Positive Impact on Community

The analysis of community reported positive changes highlights a strong preference for tangible, visible improvements particularly in infrastructure (35.5%) and transportation (20.0%) which are seen as foundational to daily life and enablers of broader development.

While WASH (19.1%), education (12.7%), and health services (12.7%) were also cited, their recognition was less frequent, suggesting the need to better integrate and communicate the value of social service improvements.

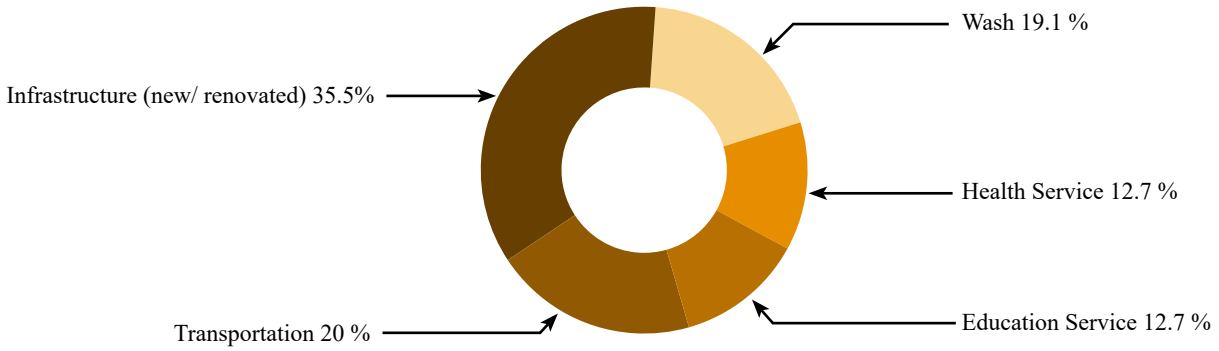

Figure 12. Key positive impacts

3.7.2 Five Key Events That Made a Negative Impact on Community

Respondents were also asked about events that have made their communities worse-off since the 2021 military coup. Communities reported that they have faced a convergence of armed violence (35.6%) and natural disasters (33.0%), compounded by economic shocks (12.4%), disease outbreaks (11.1%), and restricted access to essential services (7.9%). The dominance of conflict-related harms-such as airstrikes, shelling, and forced displacement-underscores the urgent need for protection programming, psychosocial support, and mobile or informal service alternatives in inaccessible areas.

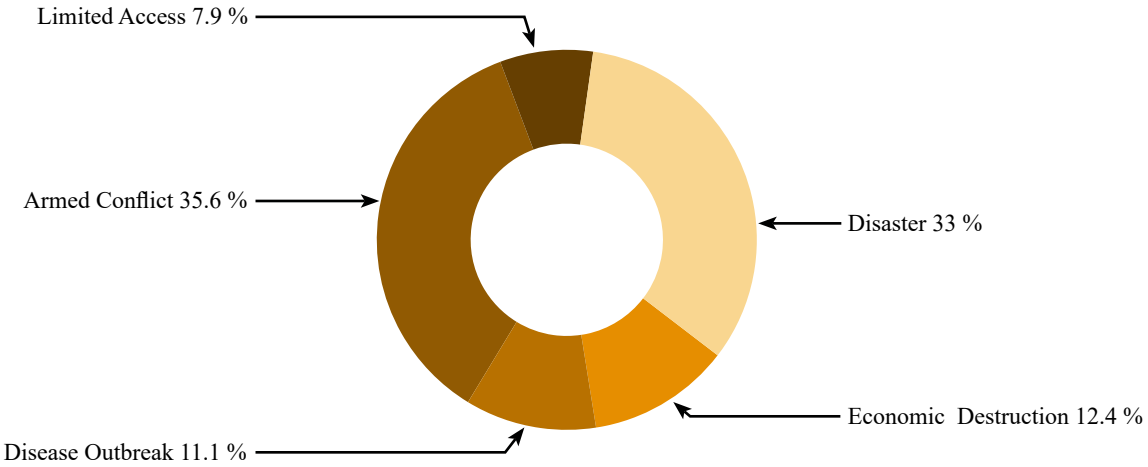

Figure 13. Key negative impacts

3.8 Community Resilience

This section uses a traffic light system as a visual proxy to assess basic infrastructure and service accessibility across regions. The colors represent the proportion of clusters meeting threshold levels for each service:

- Green = 70% or more coverage
- Yellow = 40-69% (moderate coverage)
- Red = below 40% (critical gap)

This system enables quick comparisons across regions, drawing attention to disparities that can guide programmatic targeting, policy prioritization, and resource allocation.

3.8.1 Access to basic services

Data in Table 1 highlights regional disparities in access to basic services across the surveyed areas. Access to improved water-bottled water, piped supply, protected wells, and tube wells was generally strong, with Karen, Karenni, Mon, Tanintharyi, and Nay Pyi Taw reporting at least 70% of clusters having access. However, Kachin, Shan (South), and Bago (East) showed more moderate access.

Access to electricity, phone networks, and internet showed high variation both between and within clusters. Electricity access-mainly powered with solar panels-is more consistent, with most regions reporting at least 40% of clusters where over half of households have access, with the exception of Bago (East). Phone network access is uneven, with Karenni, Shan (South), and Mon facing challenges, while only Kachin clusters show better connectivity. Internet coverage is the most limited service, with Karenni, Shan (South), and Bago (East) reporting very low or no access, and Mon being the only region where a significant portion of households within the cluster have internet access. This highlights the ongoing digital divide, where even in areas with overall service access, many households remain disconnected, further compounding challenges in communication and access to information.

Regions/ States	Improved Water (%)	At least 50% of households within cluster with electricity access (%)	At least 50% of households within cluster with phone network access (%)	At least 50% of households within cluster with internet coverage (%)
Karen	🟢	🟡	🟡	🟡
Karenni	🟢	🟡	🔴	🔴
Shan (South)	🟡	🟡	🔴	🔴
Mon	🟢	🟡	🔴	🟢
Tanintharyi	🟢	🟡	🟡	🔴
Kachin	🟡	🟢	🟢	🟡
Nay Pyi Taw	🟢	🟡	🟡	🔴
Bago (East)	🟡	🔴	🟡	🔴

Table 2. Access to basic services by surveyed areas

3.8.2 Access to infrastructure and transportation

Infrastructure and transport access across surveyed clusters was limited. These findings reflect the conditions of the sampled communities, rather than the entire state, region or union territory, and highlight the structural marginalization experienced by remote populations. Across all states and regions, less than 40% of clusters had access to paved roads. Public transport was partially available in Karenni, Mon, and Tanintharyi, whereas all other surveyed areas reported less than 40% coverage. Proximity to towns and villages was similarly limited, with Karen, Mon, and Bago (East) reporting less than 40% of clusters located within 10 miles of the nearest settlement - indicating high levels of isolation that further constrain service delivery and community connectivity.

Regions/ States	Paved Road (%)	Public Transport Availability (%)	<10 Miles from Nearest Town (%)	<10 Miles from Nearest Village (%)
Karen	🔴	🔴	🔴	🔴
Karenni	🔴	🟡	🟡	🔴
Shan (South)	🔴	🔴	🟡	🟡
Mon	🔴	🟡	🔴	🔴
Tanintharyi	🔴	🟡	🔴	🟡
Kachin	🔴	🔴	🟡	🟡
Nay Pyi Taw	🔴	🔴	🟡	🔴
Bago (East)	🔴	🔴	🔴	🔴

Table 3. Access to infrastructure and transport by surveyed areas

3.8.3 Access to durable housing

Housing conditions across surveyed regions reveal a widespread reliance on semi-permanent shelters that offer basic protection but remain structurally vulnerable. Metal roofing is relatively common, with Karenni, Shan (South), Kachin, and Nay Pyi Taw reporting that more than 50% of households within clusters use metal roofs, while other regions show moderate coverage. In contrast, masonry housing is notably scarce - no state or region reported more than 40% of clusters where at least half of households live in masonry-built structures. This reflects a general dependence on non-durable housing materials, highlighting the heightened vulnerability of communities, particularly in disaster-prone or conflict-affected settings, where safe and resilient shelter is essential for long-term protection and stability.

Regions/ States	> 50% households with metal roofing	> 50% households with masonry
Karen	🟡	🔴
Karenni	🟢	🔴
Shan (South)	🟢	🔴
Mon	🟡	🔴
Tanintharyi	🟡	🔴
Kachin	🟢	🔴
Nay Pyi Taw	🟢	🔴
Bago (East)	🟡	🔴

Table 4. Housing and shelter by surveyed aeras

3.8.4 Access to education and equity

Availability of Schools within Clusters

Regions/ States	Primary School	Secondary School	High School
Karen	🟢	🔴	🔴
Karenni	🟢	🔴	🔴
Shan (South)	🟢	🟡	🔴
Mon	🟢	🔴	🔴
Tanintharyi	🟢	🔴	🔴
Kachin	🟢	🟡	🟡
Nay Pyi Taw	🟢	🔴	🔴
Bago (East)	🟢	🔴	🔴

Table 5. Availability of schools within communities by surveyed areas

The education landscape across surveyed regions reveals strong access to primary education, with over 70% of clusters in all regions reporting the presence of a primary school within the community. However, access to middle school (grades 6-10) and high school (grades 11-12) is severely limited. Most clusters lacked infrastructure for post-primary education, with only Shan (South) reporting partial access to middle school, and Kachin reporting partial access to middle and high schools.

Figure 14. A middle school destroyed by an air strike

Equity and quality of primary school

Regions/ States	> 50% eligible boys attending primary school (%)	> 50% eligible girls attending primary school (%)	Primary school with enough teachers (%)	Primary school in good to excellent conditions (%)
Karen	🟡	🟢	🟢	🟡
Karenni	🟢	🟢	🟡	🔴
Shan (South)	🟢	🟢	🟢	🔴
Mon	🟡	🟢	🟡	🔴
Tanintharyi	🟡	🟢	🟡	🔴
Kachin	🟡	🟢	🟢	🟡
Nay Pyi Taw	🟢	🟢	🔴	🟡
Bago (East)	🟢	🟢	🟡	🟡

Table 6. Equity and quality of primary school by surveyed areas

Figure 15. Primary school students in the jungle

In all surveyed areas, over 70% of surveyed clusters had more than half of eligible girls attending primary school, while boys' attendance lagged slightly behind in Karen, Mon, Tanintharyi, and Kachin. Teacher availability was relatively strong in Karen, Shan (South), and Kachin, though other surveyed areas faced staffing limitations. However, the condition of school facilities remains a major concern, with Karenni, Shan (South), Mon, and Tanintharyi reporting poor infrastructure, and very few schools across regions rated as being in good to excellent condition.

Equity and Quality of Middle School

Regions/States	> 50% eligible boys attending middle school (%)	> 50% eligible girls attending middle school (%)	Middle school with enough teachers (%)	Middle school in good to excellent conditions (%)
Karen	🟡	🟡	🟡	🟡
Karenni	🟢	🟢	🔴	🔴
Shan (South)	🟡	🟢	🟡	🔴
Mon	🔴	🟢	🟡	🟡
Tanintharyi	🔴	🟡	🔴	🔴
Kachin	🔴	🟢	🟢	🟡
Nay Pyi Taw	🔴	🟢	🔴	🔴
Bago (East)	🟢	🟢	🟢	🟢

Table 7. Equity and quality of middle school by surveyed areas

Girls' attendance at the middle school level generally outpaced boys'. In Karenni, Shan (South), Mon, Kachin, Nay Pyi Taw, and Bago (East), more than 70% of surveyed clusters reported over half of eligible girls attending middle school. In contrast, Mon, Tanintharyi, Kachin, and Nay Pyi Taw show notably lower middle school attendance for boys, indicating emerging gender gaps in post-primary education access. Teacher availability at the middle school level is uneven-Kachin and Bago (East) report adequate staffing, while Karenni, Tanintharyi, and Nay Pyi Taw face significant shortages. School infrastructure remains a key concern, with most surveyed areas reporting facilities in poor or only moderate condition. Bago (East) is the exception, with schools generally rated in good condition.

Figure 16. Middle school students in the jungle

Equity and Quality of High School (within or outside community)

The data on high school equity and quality highlights significant access and resource constraints across surveyed regions. Boys' attendance is notably low, with no region reporting that over 50% of eligible boys attend high school. Girls' attendance is slightly higher, with Mon, Kachin, Shan (South), and Nay Pyi Taw showing moderate access, and Kachin being the only region where girls' attendance exceeds that of boys. Teacher availability remains limited, with only Bago (East) reporting sufficient staffing, while Karenni, Tanintharyi, and Nay Pyi Taw face acute shortages. In terms of infrastructure, Mon, Kachin, and Bago (East) report some schools in good to excellent condition, while other regions continue to rely on facilities that are rated as fair or poor.

Regions/States	> 50% eligible boys attendinghigh school (%)	> 50% eligible girls attending high school (%)	High school with enough teachers (%)	High school good to excellent conditions (%)
Karen	🔴	🔴	🟡	🟡
Karenni	🔴	🟡	🔴	🔴
Shan (South)	🔴	🟡	🔴	🟡
Mon	🟡	🟡	🟡	🟢
Tanintharyi	🔴	🔴	🔴	🔴
Kachin	🔴	🟢	🟡	🟢
Nay Pyi Taw	🔴	🟡	🔴	🔴
Bago (East)	🔴	🔴	🟢	🟢

Table 8. Equity and quality of high school by surveyed aeras

Figure 17. Schoolchildren taking exams in the jungle

3.8.5 Access to healthcare and market accessibility and availability

Regions/States	Health facility accessible within 30 min (%)	Healthcare available within 12 months (%)	Market accessible within 30 min (%)	Market available within 12 months (%)
Karen	🟢	🟡	🟡	🔴
Karenni	🟢	🔴	🔴	🔴
Shan (South)	🟢	🔴	🟡	🔴
Mon	🟡	🔴	🔴	🔴
Tanintharyi	🟢	🔴	🔴	🔴
Kachin	🟢	🔴	🟢	🔴
Nay Pyi Taw	🟢	🔴	🟡	🔴
Bago (East)	🟢	🔴	🔴	🔴

Table 9. Access to health services and markets by surveyed areas

Most surveyed areas reported having access to healthcare services within 5 kilometers. However, most clusters also reported that community members had faced challenges in accessing health services within the past 12 months of the survey, such as the lack of healthcare providers, medical equipment, and/or medicines. Only communities in Karen State reported moderate access to care within the past 12 months of the survey. Market access was even more constrained. Across all states and regions, few surveyed sites had access to a market within 5 kilometers, and none reported consistent market availability over the past year. This disconnect between geographic presence and operational functionality is likely driven by conflict, displacement, or broader systemic disruptions, underscoring the fragility of essential services in these contexts.

Figure 18. An emergency referral of a patient to the nearest health facility

Figure 19. A health worker providing outreach health services

3.8.6 Access to humanitarian assistance

Regions/States	Access to food assistance (%)	Access to non-food assistance (%)
Karen	🔴	🔴
Karenni	🔴	🔴
Shan (South)	🔴	🔴
Mon	🟡	🟡
Tanintharyi	🟡	🟡
Kachin	🟢	🟢
Nay Pyi Taw	🔴	🔴
Bago (East)	🔴	🔴

Table 10. Access to humanitarian assistance by surveyed areas

Access to food assistance and non-food assistance remains severely limited across most surveyed regions. Karen, Karenni, Shan (South), Nay Pyi Taw, and Bago (East) report no meaningful access across all three indicators, highlighting critical gaps in humanitarian support. The camp-based clusters in Kachin State were the only ones with consistently strong access. Mon and Tanintharyi reported moderate access to food and non-food assistance. These findings underscore significant service delivery gaps in already vulnerable and often remote communities.

Figure 20. Villagers fleeing from war in Karen State receiving support

HOUSEHOLD SURVEY

CHAPTER 4

4.1 Number of household members by surveyed area

The 2024 EDHS covered 3,112 households and 15,101 individuals across eight states, regions, and a union territory. The average household size was 5.1 people, slightly smaller than the 5.3 reported in the 2019 EDHS.

Karen State contributed the largest proportion of respondents, accounting for 41.2% (6,210 individuals), followed by Karenni State with 23.2% (3,506 individuals). Smaller proportions were recorded in Shan (South) (10.9%), Kachin (7.2%), Tanintharyi (6.9%), Mon (6.6%), and Bago (East) and Nay Pyi Taw (each at 2.0%).

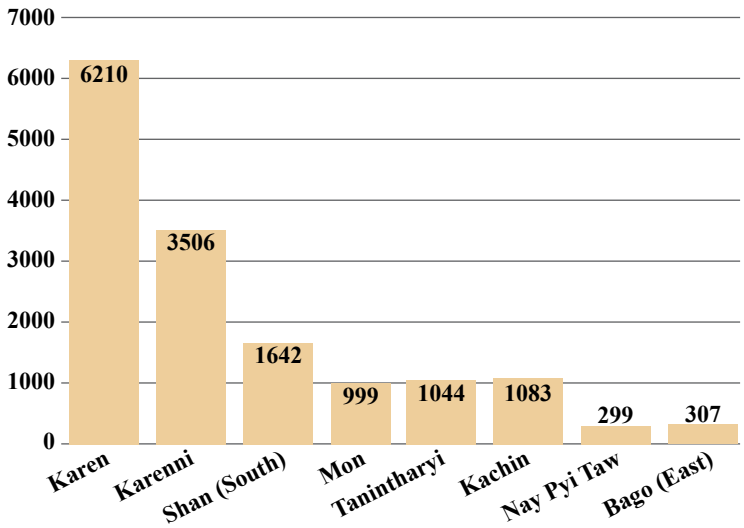

Figure 21. Total number of surveyed household members by surveyed areas

4.2 Population Pyramid

The 2024 population pyramid shows a predominantly young demographic, with a wide base that steadily narrows toward the older age groups. More than half of the population is under the age of 25, with the 5-9 and 10-14 cohorts forming the largest age groups. This pattern is commonly seen in developing settings and is reflective of sustained high fertility rates coupled with high mortality rates and low life expectancy.

Sex distribution is relatively balanced across most age bands, with a slight male predominance observed in the youngest cohorts (0-4 and 5-9). The working-age population (15-64 years) constitutes the majority, with older adults making up a much smaller proportion of the population, again consistent with elevated mortality and limited life expectancy.

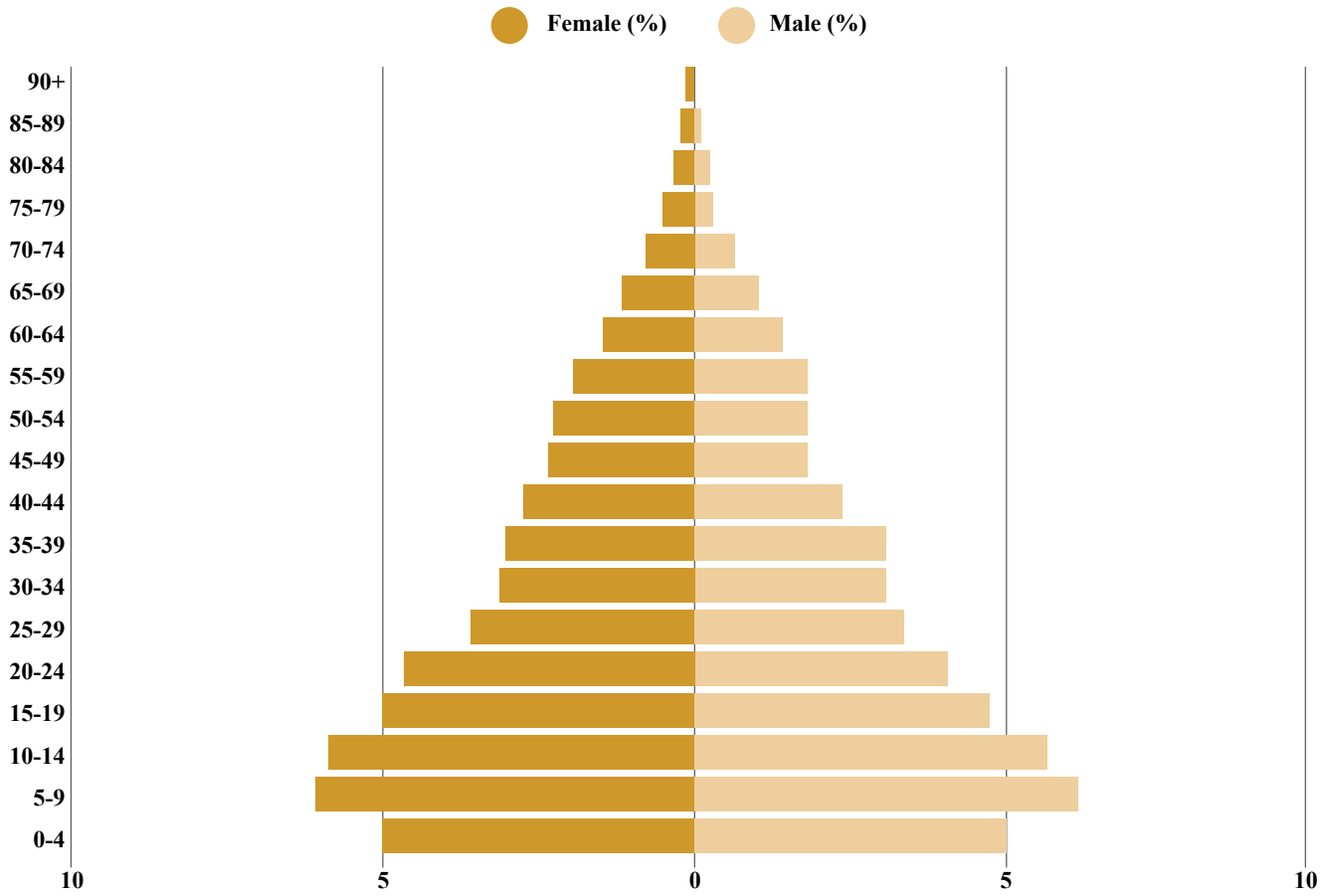

Figure 22. Population pyramid in surveyed areas

4.3 Profile of respondents

	N	%		N	%
Sex			**Education level**		
Male	1013	32.6	No Schooling, Illiterate	772	24.8
Female	2099	67.5	No Schooling, Literate	138	4.4
Age			Primary	1218	39.1
13-19	42	1.3	Secondary	523	16.8
20-29	538	17.3	High School	289	9.3
30-39	810	26.0	Monastery	98	3.1
40-49	659	21.2	University Undergraduate	51	1.6
50-59	543	17.4	University Graduate	20	0.6
60-69	361	11.6	No Response	3	0.1
70-79	121	3.9	**Occupation**		
80-90	32	1.0	No income	351	11.3
No Response	6	0.2	Unskilled Wage Labor	445	14.3
Marital Status			Agriculture/Farming	1870	60.1
Single	157	5.0	Salaried Employees	117	3.8
Married	2620	84.2	Trading/Small Business	92	3.0
Widowed, divorced, or separated	328	10.5	Handicraft	28	0.9
No Response	7	0.2	Support (Family, Social welfare)	133	4.3
			Remittances	39	1.3
			Other	35	1.1

Table 11. Profile of survey respondents

The respondent profile reflects a predominantly rural and agrarian population, with two-thirds of participants being women and a majority concentrated in the working-age range of 30-59. Most respondents are married, and formal education levels remain low-nearly 30% have never attended school, and less than 2% have completed university. Agriculture is the dominant livelihood, engaging over 60% of respondents, while formal employment and business activities are limited. A small but notable segment relies on social support or remittances, highlighting pockets of economic vulnerability.

4.4 Profile of households

	N	%		N	%
Language(s) spoken			**Ethnicity**		
Karen	1171	37.6	Karen	1228	39.5
Kayan	735	23.6	Kayan	712	22.9
Mon	485	15.6	Mon	485	15.6
Kayah	203	6.5	Kayah	212	6.8
Jinghpo	170	5.5	Jinghpo	170	5.5
Burmese	161	5.2	Kayaw	118	3.8
Kayaw	109	3.5	Lisu	45	1.4
Lisu	45	1.4	Burman/Bamar	47	1.5
Shan	17	0.5	Kawyawmano (Manumanaw)	31	1.0
Manaw	14	0.4	Paye	29	0.9
Others	2	0.2	Shan	21	0.7
Religion			Manaw	11	0.4
Christianity	1544	49.6	**Others**	3	0.1
Buddhism	1470	47.2			
Others (Islam, Animism, etc.)	98	3.1			

Table 12. Profile of households surveyed

The households surveyed are highly diverse. The majority identify as Karen (39.5%), followed by significant representation from Kayan (22.9%) and Mon (15.6%) communities. This ethnic composition is mirrored in language use, with Karen, Kayan, and Mon being the most spoken languages. Religious affiliation is nearly evenly split between Christianity (49.6%) and Buddhism (47.2%).

4.5 Wealth distribution by surveyed areas

The survey used the **Equity Tool** adapted from the Myanmar DHS wealth index to assess household economic status and identify inequities across regions using a nationally comparable framework[8]. Indicators included household assets (phone, radio, vehicle), housing materials (roofing, flooring), access to water and sanitation, and cooking fuel type. Households were scored using a standardized algorithm and placed into national wealth quintiles. The wealth distribution across surveyed regions reveals economic disparities, with most households in Karen, Karenni, Mon, Tanintharyi, and Nay Pyi Taw in the bottom 40% of the national wealth quintiles - underscoring widespread poverty and vulnerability. In contrast, Kachin stands out with a relatively stable economic profile, where nearly three-quarters (74.5%) of households fall within the middle-income group. Shan (South) shows a more balanced distribution but lacks representation in the richest quintile, pointing to limited upward mobility. Bago (East) records the highest concentration of extreme poverty, with 45% of households in the poorest 20%. Across all regions, the presence of households in the richest 20% is minimal, highlighting a narrow wealth ceiling and broader structural inequality.

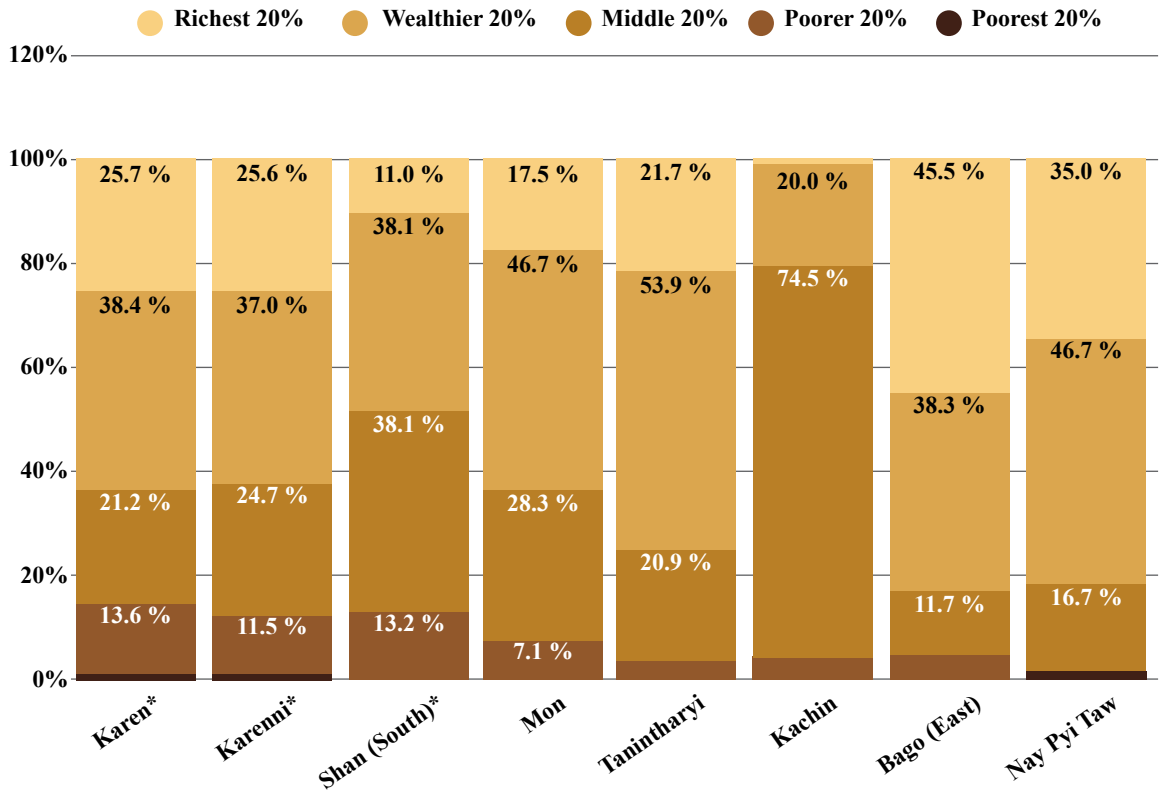

Figure 23. Distribution of household wealth quintile by surveyed areas

4.6 Migration

4.6.1 In- vs out-migration

The migration data shows net population loss across all regions since the 2021 military coup, with significantly more people leaving than arriving. Karenni and Karen States experienced the highest net out-migration, together accounting for nearly 80% of the total net migration deficit in surveyed communities, likely reflecting intense push factors such as conflict, insecurity, or lack of opportunities. Other regions like Tanintharyi, Shan (South), and Nay Pyi Taw also show moderate outflows, while Mon, Kachin, and Bago (East) experienced relatively minimal movement. No surveyed area recorded a net gain in population.

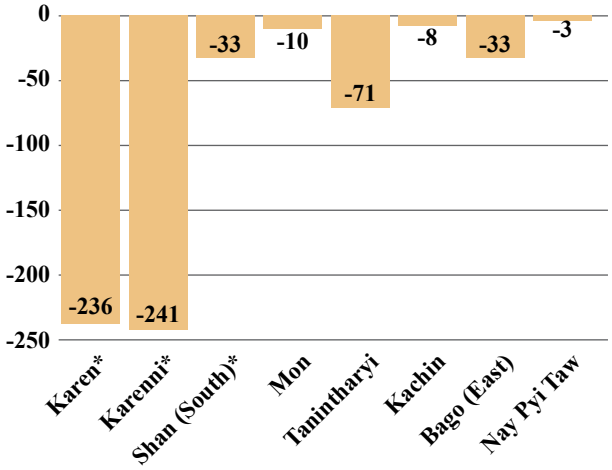

Figure 24. Household-level net migration by surveyed areas

4.6.2 Origin-Destination Flow

Migration patterns across regions reflect a layered interaction of displacement, labor mobility, and socio-political context. Karenni and Karen States display a blend of internal displacement and international labor migration-driven by conflict and long-standing cross-border ties-while Tanintharyi and Bago (East) show a stronger economic migration profile, with over half of migrants heading abroad. In contrast, Kachin and Mon show more localized movement, likely due to close-knit communities and fewer external labor linkages. Shan (South) and Nay Pyi Taw present more mixed mobility trends, balancing inter-state and limited international movement.

From / To	Within Same State (%)	Another State (%)	East & SE Asia (%)	Others (%)
Karen	49.5	5.4	42.4	2.9
Karenni	47.3	14.7	32.6	5.4
Shan (South)	0.0	37.1	51.4	11.4
Mon	66.7	19	11.9	2.4
Tanintharyi	34.3	12.4	51.4	1.9
Kachin	93.1	4.9	2.0	0.0
Nay Pyi Taw	39.4	57.6	0.0	3.0
Bago (East)	0.0	0.0	100	0.0

50 % & Above | 30 to 49 % | 10 to 29 % | Below 10 %

Figure 25. Heatmap of origin-destination flow

4.6.3 Migration trends by age and sex

Migration in Burma is increasingly driven by young people, with over two-thirds of all migrants under the age of 25. Youth aged 15–24 form the largest group (n=481), followed by children under 15 (n=270), indicating that migration often begins early in life and includes entire families or unaccompanied youth seeking safety, education, or livelihoods. This trend has likely been accelerated by the junta's reinstatement of conscription laws in 2024, prompting a surge in youth outflows-particularly among young men attempting to avoid forced military service.

There is a slight overall majority of female migrants, with the gender imbalance more pronounced among children and youth. This pattern may be influenced by caregiving responsibilities, access to education, and protection risks that are especially relevant for girls. Adults aged 25-49 make up roughly one quarter of migrants, with men the majority in this working-age group – highlighting common labor migration patterns. Migration among older adults is rare, accounting for just 5.4% (n=60) of the migrants in surveyed households.

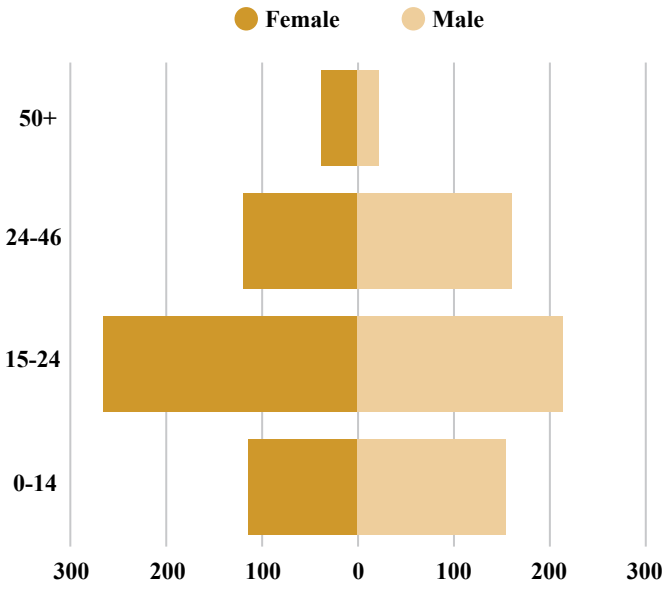

Figure 26. Migration patterns by age and sex

4.7 Mortality

4.7.1 Crude, infant, and under-5 mortality rates

Mortality patterns in Burma's ethnic areas remain notably higher than national and regional benchmarks, despite gradual improvements. In 2024, the Crude Mortality Rate (CMR) in ethnic regions was 9.0 per 1,000 population (95% CI: 7.5-10.5), comparable to national estimates, but higher than the estimates for other Southeast Asian countries like Cambodia (6.0), Indonesia (8.0), Laos (6.0), and the Philippines (6.0). The Infant Mortality Rate (IMR) in the surveyed ethnic areas of Burma-62.0 per 1,000 live births-is almost double the national estimate (34.1) and triple the estimate in countries like Cambodia (20.0), Indonesia (17.0) and the Philippines (22.0). The Under-5 Mortality Rate (U5MR) in the surveyed ethnic areas of Burma follows a similar trend, reaching 85.3 in 2024, compared to

38.7 in Burma nationally.

While the Burma Census and global estimates suggest national child mortality has declined, the persistently elevated rates in ethnic regions-particularly the IMR and U5MR-point to stark geographic inequities in survival outcomes. These figures reflect both historical underinvestment and ongoing access barriers due to conflict, displacement, and weak health infrastructure. Urgent, equity-focused investments are needed to close these gaps and improve child survival in Burma's most vulnerable regions.

Year	Crude Mortality Rate (CMR)	Infant Mortality Rate (IMR)	Under-5 Mortality Rate (U5MR)
Ethnic Surveyed Areas			
2024	9.0 (7.5–10.5)	62.0 (31.6–92.4)	85.3 (49.6–120.9)
2013[9]	--	94.2 (66.5–133.5)	141.9 (94.8–189.0)
2008[10]	13.0 (11–15)	77.0 (56–98)	139.0 (107–171)
2004[11]	--	--	218.0 (135–301)
2003[12]	21.0 (15–27)	122.0 (70–175)	276.0 (190–361)
2002[13]	25.0 (21–29)	135.0 (96–181)	291.0 (238–348)
Burma			
2023[14]	9.2	34.1 (20.7-54.1)	38.7 (23.5-61.4)
2014[15]	9.6	62.0	38.7 (23.5-61.4)
Southeast Asia 2023			
Cambodia	6.0	20.0	22.9 (10.9-49.2)
Indonesia	8.0	17.0	20.6 (15.2-28.1)
Laos	6.0	35.0	39.0 (26.0-58.1)
Burma	9.0	34.0	38.7 (23.5-61.4)
Philippines	6.0	22.0	26.9 (20.5-35.9)
	Source: https://data.worldbank.org/indicator/SP.DYN.CDRT.IN?view=chart	Source: https://data.worldbank.org/indicator/SP.DYN.IMRT.IN	Source: https://data.unicef.org/topic/child-survival/under-five-mortality/

Rates are per 1,000 population (CMR) or per 1,000 live births (IMR, U5MR); 95% confidence intervals shown in parentheses.
Table 13. Mortality table

4.7.2 Age-specific mortality rates

The age-specific mortality rates (ASMRs)[16] reveal clear patterns by age and sex, specifically mortality among older people, with rates reaching 184.0 per 1,000 for men and 140.6 for women, and begins to rise steeply from age 50 onwards. Children under five also face high mortality risks, especially boys (57.5 per 1,000) compared to girls (39.3), reflecting persistent child health and survival challenges. In contrast, mortality is lowest among school-aged children (5-14 years), where rates are below 4 per 1,000 for both sexes.

A particular trend emerges in the 15-49 age range, where mortality is significantly elevated among men compared to women. Among youth (15-24), male mortality is more than ten times higher than female rates, and the gap continues into adulthood (25-49), likely driven by conflict, violence, and other external causes disproportionately affecting men.

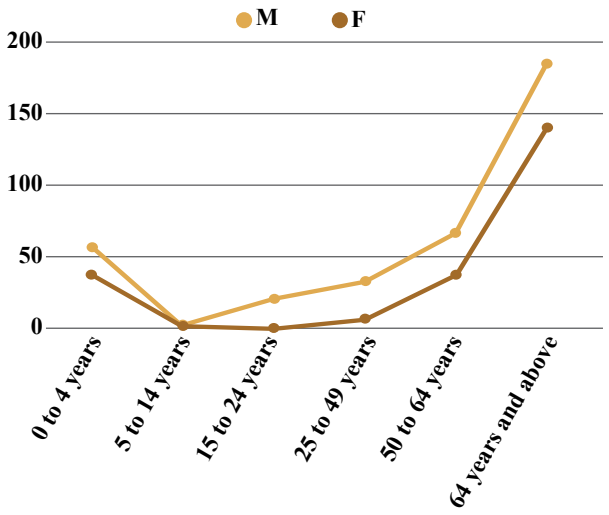

Figure 27. ASMR per 1000 between 2020 and 2024

4.7.3 Causes of death, disaggregated by sex

The cause of death data highlights a dual burden of communicable and non-communicable diseases, with marked gender disparities. Trauma is the leading specified cause of death among men, reflecting heightened exposure to conflict-related violence (n=36), accidents (n=18), self-inflicted (n=10), assault/murder (n=3), or unknown causes (n=2). In contrast, endocrine conditions such as diabetes appear to be more prevalent for women. Respiratory and gastrointestinal diseases are common among both sexes, though more prevalent for men.

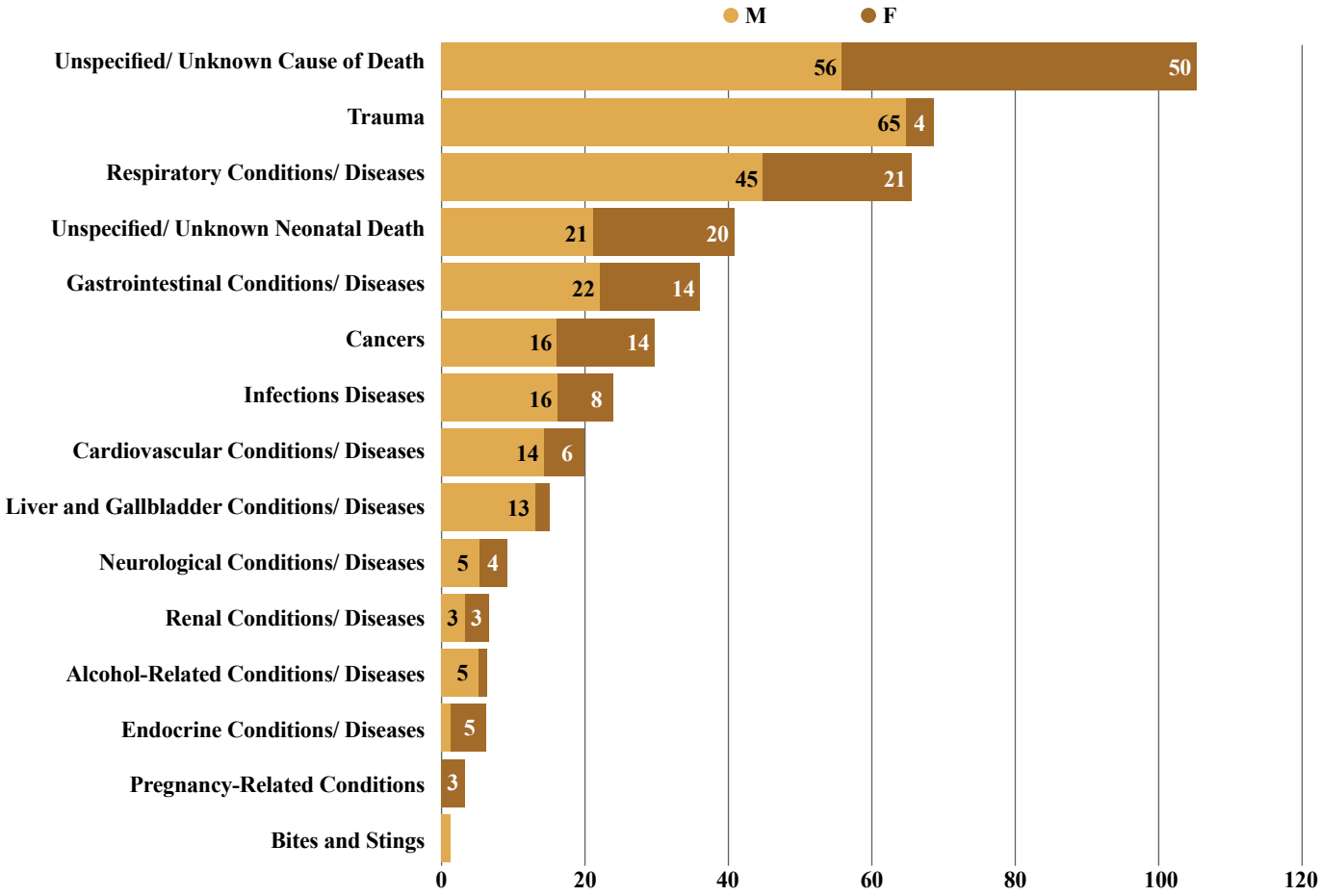

Figure 28. Causes of death, disaggregated by sex

4.7.4 Causes of death, disaggregated by age

The distribution of causes of death follows a clear age-related pattern, reflecting a shift from infectious and neonatal causes in early childhood to trauma in young adulthood, and NCDs in older age. Among children under five, neonatal complications, respiratory infections, and gastrointestinal diseases were the main causes of death. Trauma emerged as the leading cause of death among those aged 15-49, reflecting the impact of conflict, accidents, and violence. In adults over 50, mortality was increasingly driven by NCDs such as cardiovascular, respiratory, gastrointestinal, and liver diseases, as well as cancers. Notably, a high proportion of deaths - particularly among the elderly - are recorded as unknown or unspecified. This reflects critical gaps in diagnostic capacity, medical documentation, and death certification, particularly in remote or conflict-affected areas where access to health facilities is more limited.

Figure 29. A funeral ceremony for a mother and two children, two school committee members killed in an air strike

Age Groups	<=4	5-14	15-24	25-49	50-64	>=64
Unspecified/ Unknown Cause of Death	0.8 %	0.1 %	0.2 %	0.3 %	1.1 %	6.3 %
Trauma	0.1 %	0.1 %	0.1 %	0.6 %	0.4 %	0.5 %
Respiratory Conditions/ Diseases	0.7 %	0.1 %	0.0 %	0.3 %	0.9 %	2.9 %
Unspecified/ Unknown Neonatal Death	2.7 %					
Gastrointestinal Conditions/ Diseases	0.6 %			0.1 %	0.7 %	1.3 %
Cancers				0.2 %	0.7 %	1.1 %
Infections Diseases	0.1 %	0.1 %	0.1 %	0.1 %	0.2 %	1.1 %
Cardiovascular Conditions/ Diseases				0.1 %	0.2 %	1.3 %
Liver and Gallbladder Conditions/ Diseases				0.1 %	0.4 %	0.5 %
Neurological Conditions/ Diseases		0.0 %		0.1 %	0.1 %	0.4 %
Renal Conditions/ Diseases				0.0 %	0.2 %	0.1 %
Alcohol-Related Conditions/ Diseases				0.1 %	0.2 %	
Endocrine Conditions/ Diseases					0.1 %	0.5 %
Pregnancy-Related Conditions	0.1 %			0.0 %		
Bites and Stings					0.1 %	

>1 % | 0.5-1 % | <0.5 % | No Case

Figure 30. Causes of death, disaggregated by age

4.8 Maternal and reproductive healthcare

4.8.1 Women of reproductive age respondents

A total of 8,134 women were identified across surveyed households, of whom 3,974 (48.9% of all women) were of reproductive age (15–49 years). From this eligible group, 1,063 women were interviewed, typically one per household, prioritizing the caregiver of the youngest child to minimize recall bias.

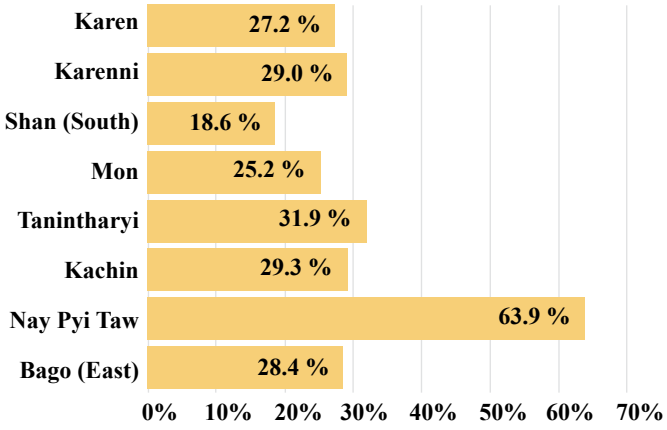

Figure 31. Surveyed women of reproductive age by surveyed areas

4.8.2 Fertility patterns and reproductive history of WRA

	Number of Pregnancies	Age at first Pregnancy
Karen	3.4 (1-15)	21.5(13-42)
Karenni	3.3 (1-14)	22.3 (14-44)
Mon	2.8 (1-10)	21.1 (16-38)
Shan (South)	3.5 (1-9)	21.8 (15-35)
Tanintharyi	3.0 (1-10)	20.5 (12-39)
Kachin	3.5 (1-9)	21.3 (14-33)
Nay Pyi Taw	4.0 (1-9)	20.7 (16-29)
Bago (East)	3.3 (1-11)	20.8 (16-26)
Overall	**3.3 (1-15)**	**21.6 (12-44)**

Figure 32. Pregnancies, age of first pregnancy

On average, women reported 3.3 lifetime pregnancies, with slight regional variation-ranging from 2.8 in Mon to 4.0 in Nay Pyi Taw. The average age at first pregnancy was 21.6 years, with limited variation across states and regions. The consistency suggests early childbearing is a norm across surveyed areas.

Across all surveyed areas, 848 respondents (80.7%) could self-report their history of miscarriages. Near-

ly one in three (31.1%) women had experienced one or more miscarriages, and 10.5% of all reported pregnancies had ended in miscarriage. However, these estimates may be under-reported, especially for miscarriages happening earlier in pregnancy and those not reported due to social stigma.

4.8.3 Antenatal care coverage and frequency

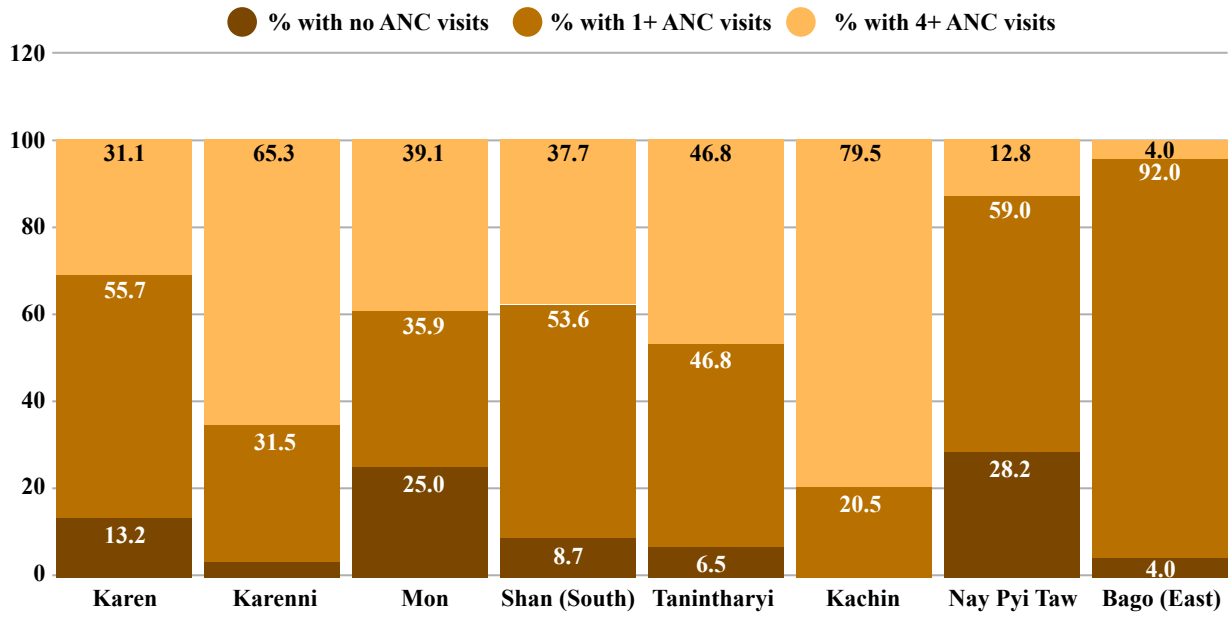

Figure 33. ANC coverage by surveyed areas

While most women reported receiving at least one ANC visit, the proportion who achieved the recommended minimum of four or more visits varied widely. Kachin and Karenni stood out with higher rates of four or more ANC visits (79.5% and 65.3%, respectively). Bago (East) had one of the highest rates of any ANC contact (92%) but very low follow-through of four visits (4%). Nay Pyi Taw had both high rates of no ANC (28.2%) and low completion of four visits (12.8%). Mon and Karen had substantial proportions of women who received no ANC at all (25.0% and 13.2%, respectively).

4.8.4 Timing of first ANC visit

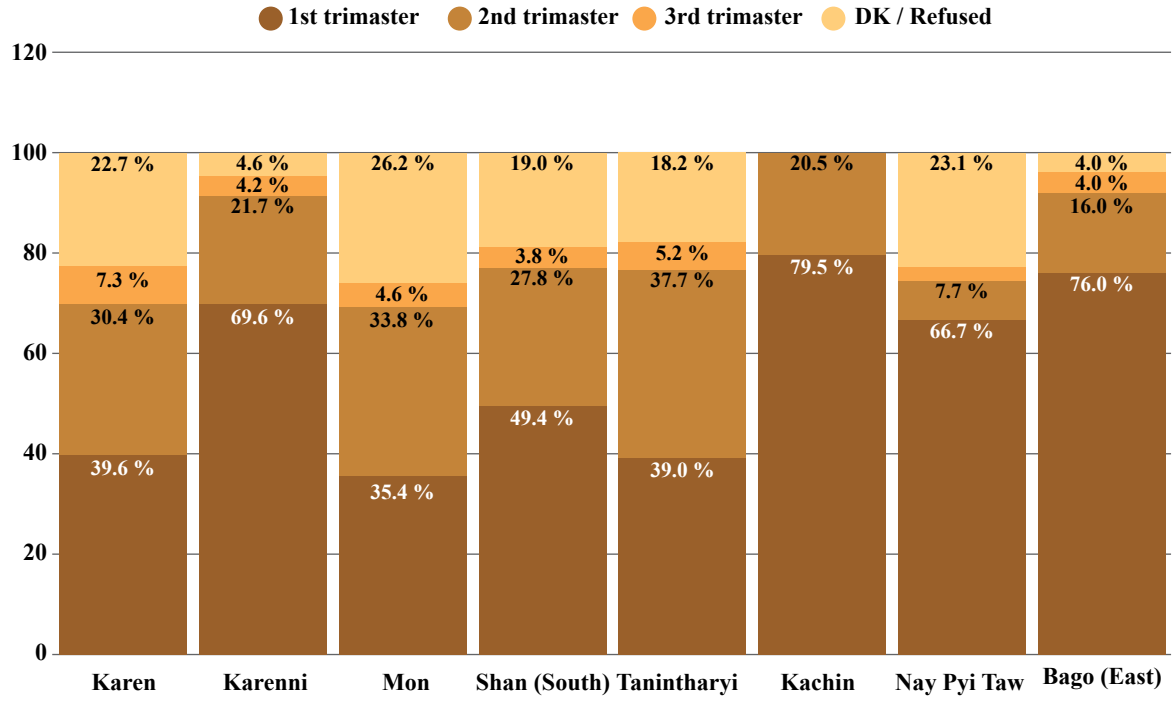

Figure 34. Timing of first ANC visit by surveyed aeras

Although the WHO recommends that women initiate their first ANC visit within the first 12 weeks of pregnancy,[17] this standard was only met by half (52.6%) of women across the eight surveyed areas. Early ANC uptake was highest in Kachin, Bago (East), and Karenni, while notably lower rates were observed in Mon, Tanintharyi, and Karen. In these latter areas, a significant proportion of women either delayed care or could not recall when they received it. These disparities may reflect barriers such as insecurity, geographic isolation, or limited access to health information and services.

4.8.5 Types of ANC services received

Regions	BP Checks	Tetanus Vaccination	Urine Testing	Counselling on danger signs	HIV Counselling	Iron & Folic Acid Supplements	B1	Deworming
Karen	91.7 %	52.9 %	61.2 %	65.8 %	37.5 %	96.3 %	86.8 %	67.4 %
Karenni	100 %	73.7 %	85.2 %	83.1 %	39.0 %	100 %	86.0 %	94.5 %
Mon	91.7 %	81.3 %	64.6 %	81.3 %	72.9 %	93.8 %	93.8 %	89.6 %
Shan (South)	100 %	100 %	79.0 %	74.2 %	40.3 %	100 %	83.9 %	91.9 %
Tanintharyi	100 %	31.6 %	43.9 %	40.4 %	10.5 %	100 %	93.0 %	35.1 %
Kachin	100 %	90.8 %	51.7 %	90.8 %	88.5 %	100 %	96.6 %	98.9 %
Nay Pyi Taw	100 %	60.7 %	64.3 %	0.0 %	0.0 %	100 %	0.0 %	96.4 %
Bago (East)	100 %	8.3 %	45.8 %	50.0 %	12.5 %	100 %	100 %	4.2 %

> 90 % | 70-89 % | 50-69 % | < 50 %

Figure 35. Quality of ANC services by surveyed areas

The quality of ANC varied widely across surveyed regions. While most women who accessed ANC received basic interventions - such as blood pressure (BP) monitoring and iron/folic acid supplements - coverage of more comprehensive services was inconsistent. WHO guidelines recommend a full package of preventive care, including tetanus vaccination, HIV counselling, urine testing, deworming, and danger sign education. The low coverage of critical components like tetanus vaccination (average 62.4%), urine testing (62.0%), danger sign education (60.7%) and HIV counselling (37.7%) highlights gaps in service quality that may compromise maternal and newborn health outcomes.

Figure 36. A women receiving ANC services from a health worker at a monastery after fleeing from armed conflict in her village

4.8.6 Delivery place for last delivery

Figure 37. A health worker creating a birth record for a newborn baby

Delivery outside of a health facility remains one of the most critical gaps in the maternal care continuum across surveyed areas of Burma. Although ANC coverage is improving, 58.8% of women continue to give birth at home or in non-clinical settings - often without a skilled birth attendant-significantly increasing risks for both mothers and newborns. Facility-based deliveries are especially rare in Nay Pyi Taw (2.6%), Tanintharyi (22.4%), and Bago (East) (24.0%). In contrast, Kachin surveyed areas reported a 90.8% facility delivery rate.

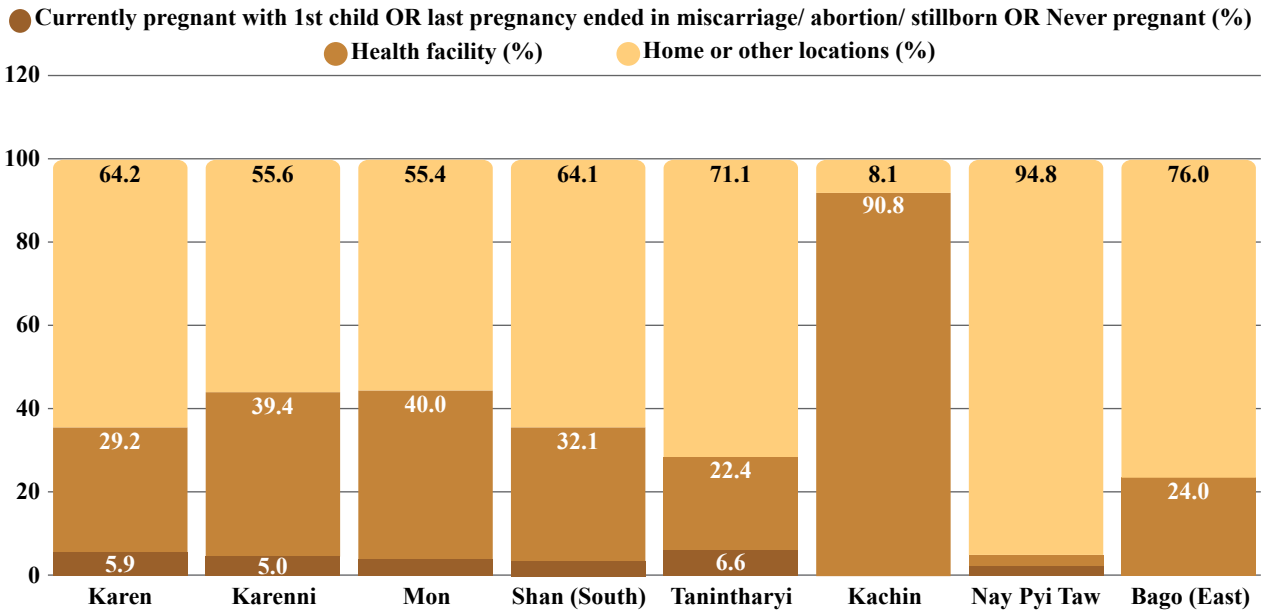

Figure 38. Place of delivery for most recent pregnancy by surveyed areas

4.8.7 Postnatal care (PNC) coverage

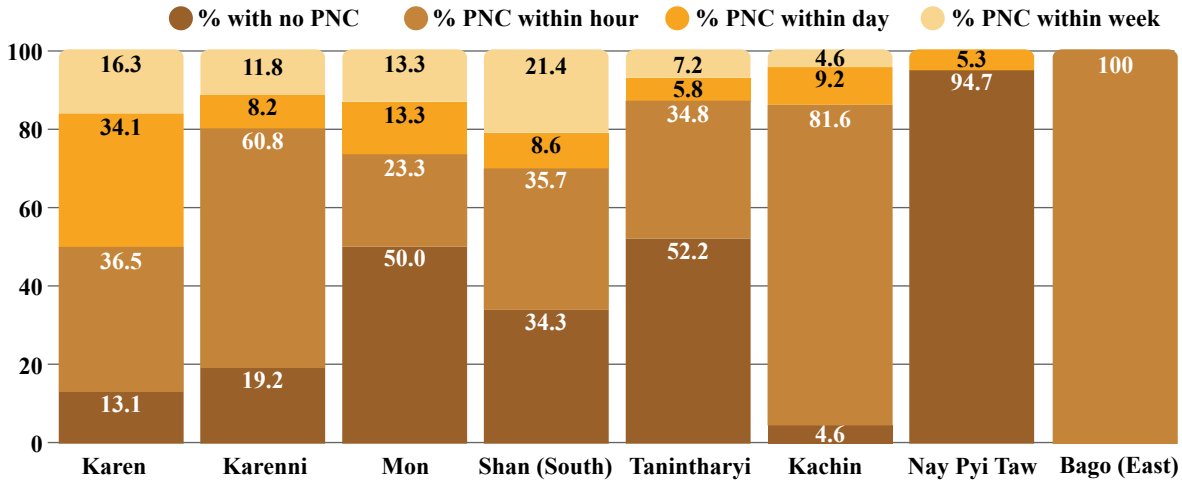

Figure 39. PNC coverage by surveyed areas

PNC is a vital component of maternal and newborn health, with the WHO recommending timely follow-up- particularly within the first 24 hours and the week after birth-to detect and manage life-threatening complications. Despite this, access to PNC remains critically low across ethnic areas of Burma. Only 46.1% of women reported receiving care within the first hour after delivery, and 23.3% received no PNC at all. Nay Pyi Taw, Tanintharyi, and Mon State reported the largest PNC gaps-94.7%, 52.2%, and 50.0% of pregnant women, respectively-did not receive any PNC. By contrast, higher rates of care within the first 24 hours were observed in Kachin (81.6%) and Karenni (60.8%). Care within the first week-another critical window-was received by only 12.6% of women overall.

4.8.8 Family planning utilization

Among the 1,063 WRA surveyed, 489 (46.0%) expressed that they did not want any more children. Yet only 42.3% of these women were using any form of family planning, leaving 54.4% without access to or use of contraception despite their desire to avoid pregnancy. This gap was especially wide in Mon (72.2% not using family planning), Shan (South) (66.7%), and Tanintharyi (64.7%). Even in higher-uptake areas like Karenni (58.8%) and Bago (East) (53.9%), unmet need remained. With more than half of women who do not wish to have children able to access contraception-and other services like skilled delivery or postnatal care still out of reach-the threat to women's health and lives remains stark.

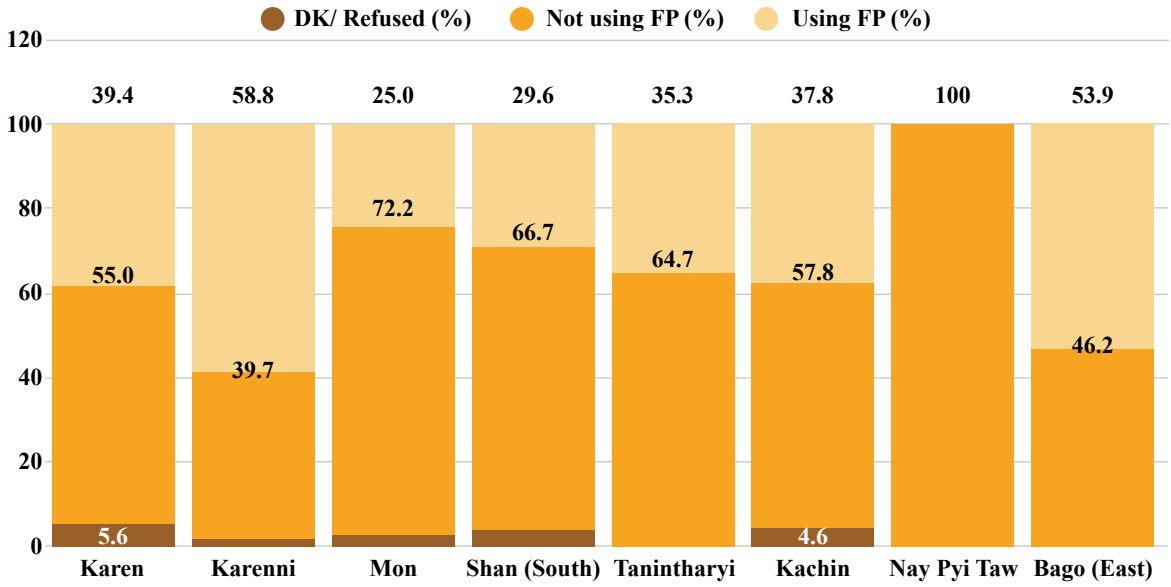

Figure 40. Unmet need for FP among WRA by surveyed areas

Figure 41. A women receiving family planning services

4.8.9 Family planning methods

Among women using contraception, injectable contraceptives (Depo) were the most reported method, used by 47% of respondents. This was followed by implants (24%) and oral contraceptive pills (21%). A much smaller proportion reported using intrauterine devices (IUDs) (2%) or sterilization (4%). Traditional methods such as calendar-based tracking, withdrawal, abstinence (2%), and breastfeeding (1%) were rarely used. Notably, no respondents reported using male condoms (0%), a finding that stands out and may point to deeper issues of access, stigma, or gender norms that limit male involvement in family planning decision-making and contraceptive use.

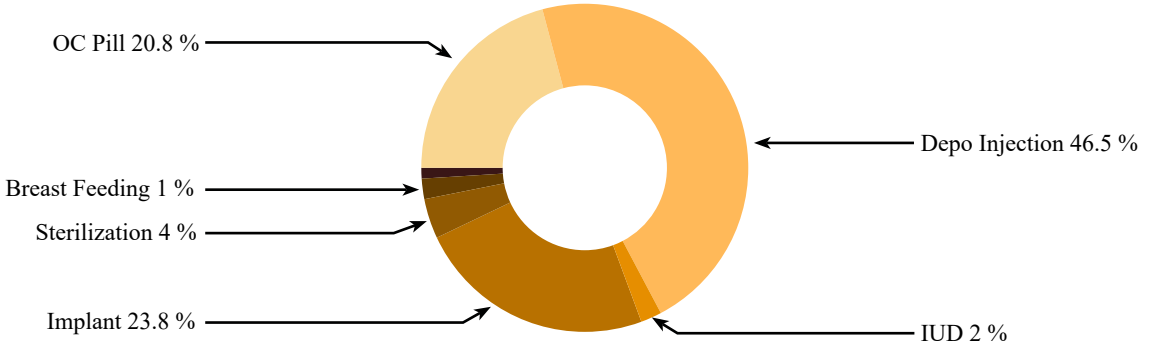

Figure 42. Types of family planning methods used by WRA

4.9 Bed net ownership

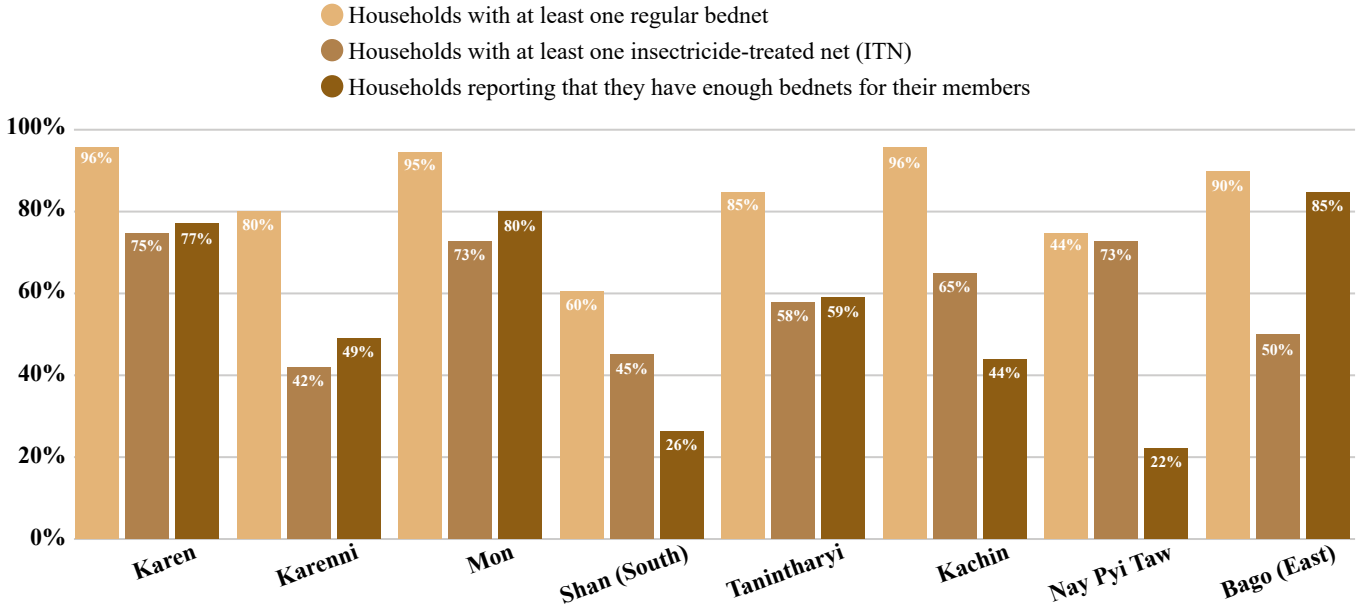

Figure 43. Bed net ownership by surveyed areas

Bed nets, particularly insecticide-treated nets (ITNs), are a cornerstone of malaria prevention in endemic areas like Burma. They are especially critical in low-resource settings, where access to treatment may be delayed. While 87% of surveyed households reported owning at least one regular bed net, only 62% had an ITN, and only 61% felt they had enough nets for all household members.

Coverage patterns varied across regions. Karen State, which is known to have high malaria endemicity, showed consistently strong coverage and perceived sufficiency (77%). In contrast, Shan (South) and Nay Pyi Taw had the lowest rates of ITN ownership (26% and 22%, respectively) and perceived adequacy, although Shan State's lower malaria risk may partially explain this. Some areas, such as Bago (East), showed high perceived sufficiency despite only modest ITN ownership-possibly reflecting smaller household sizes, lower perceived malaria risk, or differences in distribution systems.

4.10 Disability

Disability Measurement Methodology

Disability status was measured using the Washington Group Short Set of Questions on Disability (WG-SS)[18], which includes six functional domains: seeing, hearing, walking or climbing steps, remembering or concentrating, self-care, and communicating. Respondents were asked to self-report their level of difficulty in each domain using a standardized 4-point Likert scale:

1. No difficulty
2. Some difficulty
3. A lot of difficulty
4. Cannot do at all

Consistent with the approach used in the 2014 Myanmar Population and Housing Census and international WG-SS guidance, a binary disability variable was constructed, where individuals were classified as having a disability if they reported any difficulty (i.e., response categories 2-4) in at least one of the six domains.

4.10.1 Prevalence of disability

The overall disability prevalence across all surveyed areas was 2.8%, with variation between surveyed sites. Shan (South) reports the highest rate at 5.8%, followed by Karenni at 4.7%. Nay Pyi Taw and Bago (East) sites had the lowest recorded prevalence at 0.3% and 0.0%, respectively. The prevalence of disability in the surveyed ethnic areas of Burma was significantly lower than the national estimate of 12.8%,[19] possibly due to the study methodology-in which the primary respondent reported disability challenges on behalf of all household members-and due to factors like lack of awareness and stigma around disabilities that contributed to reluctance to self-report.

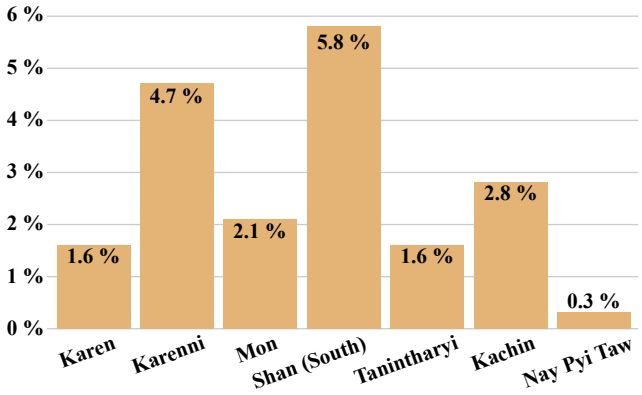

Figure 44. Prevalence of disabilities by surveyed areas

4.10.2 Types of Disabilities

Mobility impairments (1.2%), visual difficulties (1.0%), and cognitive challenges (0.8%) were the most reported disability types across all surveyed areas, while hearing, self-care, and communication disabilities were less prevalent. Shan (South) and Karenni reported the highest rates across multiple domains, particularly in mobility and cognition. In contrast, Karen, Mon, and Tanintharyi sites exhibited low prevalence, while Kachin shows moderate rates in mobility and cognitive issues.

State/ Region[20]	Seeing	Hearing	Walking/ Climbing Steps	Remembering/ Concentrating	Self-Care	Communication
Karen	0.3 %	0.3 %	0.6 %	0.3 %	0.2 %	0.2 %
Karenni	0.4 %	1.0 %	2.1 %	1.5 %	1.2 %	0.9 %
Mon	-	0.5 %	1.0 %	0.8 %	0.4 %	0.7 %
Shan (South)	0.3 %	1.8 %	2.4 %	2.1 %	0.4 %	0.2 %
Tanintharyi	-	0.1 %	0.9 %	0.6 %	0.3 %	0.3 %
Kachin	0.1 %	0.3 %	1.4 %	0.7 %	0.7 %	0.7 %

>2% >1% >0% 0

Figure 45. Types of disabilities by surveyed areas

4.10.3 Disability status by age and sex

Disability prevalence increased significantly with age. Among children and younger adults, disability remained low-typically under 2%-suggesting that early-life functional limitations are relatively uncommon. However, from midlife onward, the prevalence begins to rise, accelerating notably after age 50. By age 60-64, one in ten individuals reported a disability, and the figures continued to climb in older age groups.

Gender differences become more visible in later life. Women aged 75 and above reported higher disability rates than men of the same age, with prevalence reaching nearly 40% among women aged 85-89. This gender gap mirrors broader patterns seen in aging populations globally, where women-often living longer and exposed to different life course risks-are more likely to report functional limitations in older age.

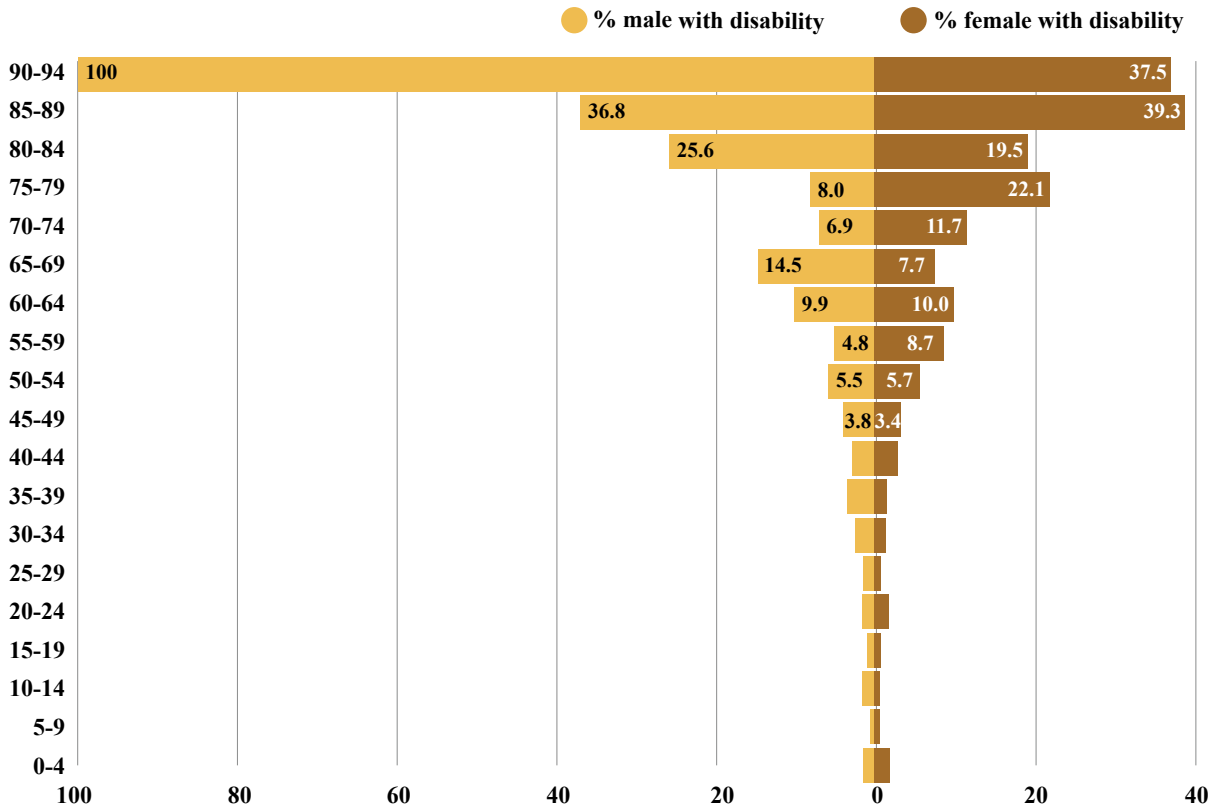

Figure 46. Prevalence of disabilities, by age and sex

4.11 Mental health

Patient Health Questionnaire-9 (PHQ-9)

PHQ-9 is a widely used screening tool designed to detect and assess the severity of depression.[21] It consists of nine questions that evaluate how often an individual has experienced symptoms such as low mood, fatigue, sleep disturbances, or difficulty concentrating over the past two weeks. Each item is scored from 0 ("not at all") to 3 ("nearly every day"), resulting in a total score between 0 and 27. Based on this score, individuals are categorized into levels of depression: no or minimal (0–4), mild (5–9), moderate (10-14), and severe (15 and above). PHQ-9 is commonly used in both clinical and community health settings as a first-line screening tool to identify individuals who may require further mental health support.

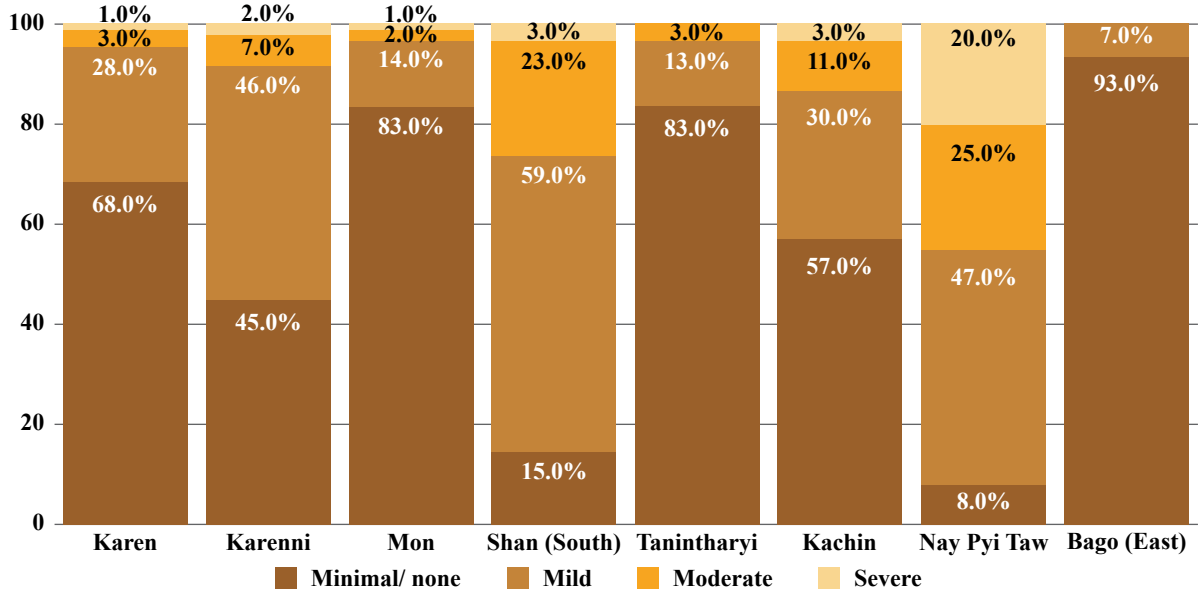

Figure 47. Prevalence of depression by surveyed areas

Survey findings using PHQ-9 show that overall, 41.4% of respondents reported some symptoms of depression, with 33.0% reporting mild depression, 6.9% reporting moderate depression, and 1.4% reporting severe depression. The highest burdens were found in surveyed communities in Shan (South), Nay Pyi Taw and Karenni. In Shan (South), 23.4% reported moderate and 3.1% severe symptoms, while Karenni recorded 7.1% moderate and 1.6% severe depression. Nay Pyi Taw's PHQ-9 scores were concerning, with 25.4% moderate depression and 20.0% severe depression.

4.12 Non-communicable diseases

Age Group	Female				Male			
	Target	Surveyed		Weight	Target	Surveyed		Weight
	#	#	%		#	#	%	
40-54 years	1,136	768	68.0 %	1.5	966	384	40.0 %	2.6
55+ years	977	759	78.0 %	1.3	896	553	62.0 %	1.6

Table 14. Weights estimated based on individuals surveyed by age group and gender

A total of 2,464 individuals aged 40 and above completed the non-communicable disease (NCD) module, representing 62% of the eligible population.[22] Participation rates varied by age and gender: 55% of adults aged 40–54 and 70% of those aged 55+ completed the module, with women more likely to participate than men in both groups. This reflects the survey design - random selection of one respondent per household for the younger age group, and full inclusion for those 55 and older. To correct for these design differences and underrepresentation of men, sampling weights were applied by age-sex subgroup.

4.12.1 Risk factors for non-communicable diseases

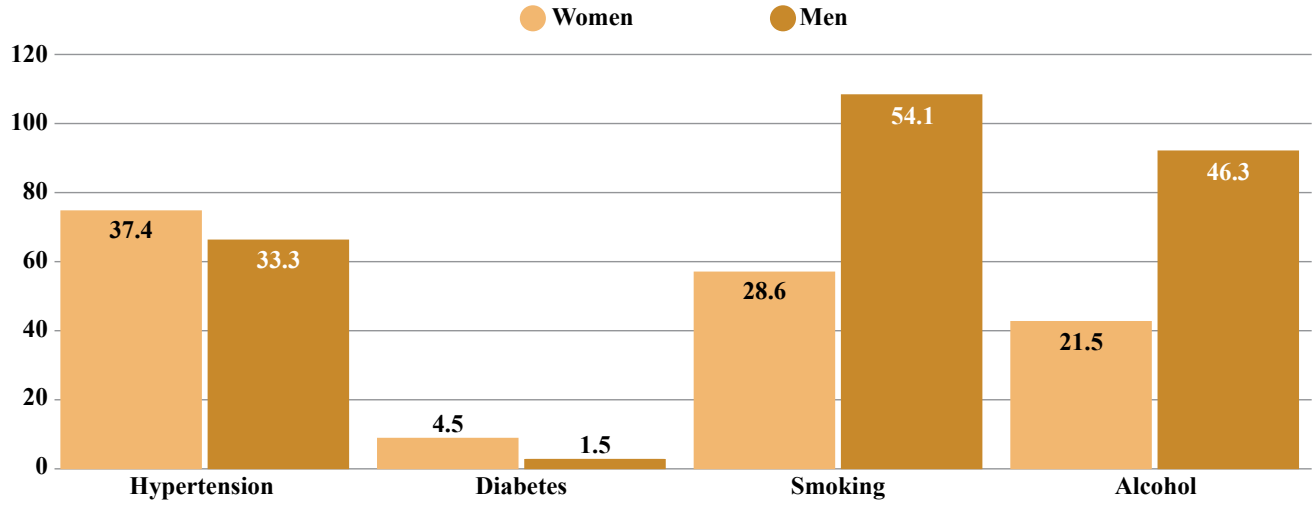

Figure 48. Prevalence of NCD risk factors by gender

Non-communicable diseases (NCDs) are closely linked to a mix of metabolic and behavioral risk factors such as hypertension, diabetes, high cholesterol, smoking, alcohol use, physical inactivity, poor diet, and obesity. These risks often interact and compound one another, increasing the likelihood of serious health outcomes.

Survey findings reveal distinct gender patterns in the distribution of these risks. Women are more affected by metabolic conditions, with higher rates of hypertension (37.4%) and diabetes (4.5%) compared to men (33.3% and 1.5%, respectively). In contrast, behavioral risk factors are more common among men, with over half reporting current smoking (54.1%) and nearly half consuming alcohol (46.3%) - more than double the rates among women. These findings underscore the importance of gender-sensitive prevention strategies that address both lifestyle-related behaviors and chronic disease management, tailored to the specific vulnerabilities of men and women.

4.12.2 Hypertension care cascade, disaggregated by sex

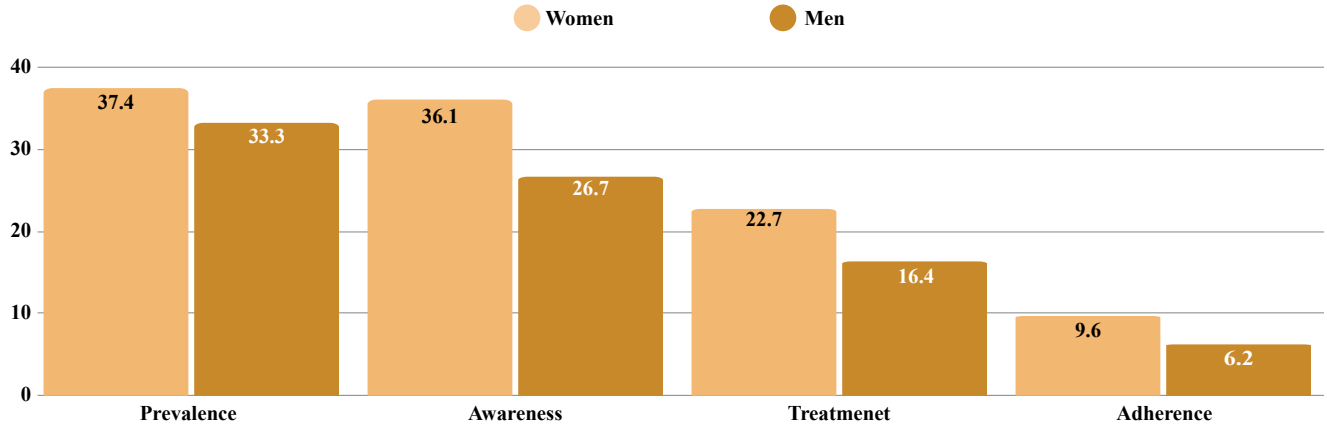

Figure 49. Hypertension care cascade by gender

Disaggregated by sex, data on the hypertension care cascade illustrates how individuals progress from diagnosis to sustained treatment and highlights where they are lost along the care pathway. While hypertension affects over a third of both women (37.4%) and men (33.3%), women show higher awareness (36.1% vs. 26.7%) and treatment rates (22.7% vs. 16.4%). However, adherence remains low for both groups, dropping to 9.6% among women and 6.2% among men. These patterns suggest that women are more likely to access care, but both sexes face barriers to maintaining long-term treatment - underscoring the need for improved continuity of care and gender-sensitive strategies to support hypertension control.

4.13 Impact of the military coup

The findings reveal multi-layered hardship across Burma since the 2021 military coup. Nearly one in four households reported direct exposure to violence, and over one-third experienced serious harm or death of someone in their close social networks. These traumatic experiences are mirrored in the high levels of psychological distress, with three-quarters of households identifying the conflict and instability caused by the military coup as a recent source of stress. Economic disruption further compounded these pressures. Nearly half of all households reported income loss since the coup, with figures exceeding 90% in Bago (East) and 83% in Tanintharyi. This convergence of physical risk, emotional trauma, and financial hardship has pushed many households into precarity.

	% directly experienced death/injury in household	% knew someone killed or injured	% experienced stress due to political-security issues	% experienced income loss
Karen	19.4	27.4	65.4	33.4
Karenni	44.0	52.7	80.1	51.2
Mon	2.5	5.4	71.7	61.3
Shan (South)	43.1	50.2	97.3	54.2
Tanintharyi	1.7	17.0	87.0	83.0
Kachin	10.5	64.0	91.5	72.0
Nay Pyi Taw	16.7	8.3	85.0	25.0
Bago (East)	18.3	15.0	16.7	91.7
Overall	**24.2**	**34.8**	**75.1**	**48.8**

Table 15. Impact of political crisis by surveyed areas

4.14 Food security

4.14.1 Mid-upper arm circumference (MUAC) of children under 5

States/ Regions	n	%SAM (<11.5 cm)		%MAM (>=11.5-12.4 cm)		% Normal (>=12.5 cm)	
		n	%	n	%	n	%
Karen	511	12	2.3 %	27	5.3 %	472	92.4 %
Karenni	229	--	--	7	3.1%	222	96.9%
Mon	52	--	--	1	1.9%	51	98.1%
Shan (South)	110	--	--	8	7.3%	102	92.7%
Tanintharyi	78	--	--	5	6.4%	73	93.6%
Kachin	72	--	--	--	--	72	100.0%
Nay Pyi Taw	49	--	--	8	16.3%	41	83.7%
Bago (East)	26	--	--	--	--	26	100.0%
Total	**1127**	**12**	**1.1%**	**56**	**5.0%**	**1059**	**94.0%**

Table 16. MUAC for children under 5 by surveyed areas

MUAC screening across surveyed regions reveals that most children under five (94%) had adequate nutritional status, though 6.1% showed signs of moderate or severe acute malnutrition (MAM/SAM), also known as global acute malnutrition (GAM). Nay Pyi Taw had concerning levels of GAM (16.3%). Karen State, Shan (South), and Tanintharyi also showed high rates of GAM at 7.6%, 7.3%, and 6.4%, respectively. Karenni State and Mon State reported lower rates of GAM. There were no recorded cases of MAM or SAM in Kachin State or East Bago Region. This suggests that acute malnutrition is not widespread, but concentrated in localized pockets of vulnerability - particularly in areas facing displacement, economic instability, or restricted health service access.

Figure 50. A child diagnosed with moderate malnutrition during receiving the health service.

4.14.2 MUAC of WRA

States/ Regions	n	% SAM (< 19 cm)		% MAM (>= 19-22 cm)		% Normal (>= 23 cm)	
		n	%	n	%	n	%
Karen	977	30	3.1%	132	13.5%	815	83.4%
Karenni	576	1	0.2%	65	11.3%	510	88.5%
Mon	194	--	--	15	7.7%	179	92.3%
Shan (South)	176	--	--	14	8.0%	162	92.0%
Tanintharyi	193	--	--	16	8.3%	177	91.7%
Kachin	192	--	--	10	5.2%	182	94.8%
Nay Pyi Taw	61	1	1.6%	34	55.7%	26	42.6%
Bago (East)	54	--	--	1	1.9%	53	98.1%
Total	**2423**	**32**	**1.3%**	**287**	**11.8%**	**2104**	**86.8%**

Table 17. Muac for WRA by surveyed areas

MUAC screening of 2,423 WRA across regions indicates that the overall burden of acute malnutrition remained low, with 86.8% classified as having adequate nutritional status, 11.8% as MAM, and 1.3% as SAM. Most states and regions reported strong nutrition outcomes, particularly Bago (East), Kachin, Mon, and Tanintharyi, where over 90% of individuals fall within the normal range and SAM was not observed. However, Karen State shows a higher burden, with 3.1% SAM and 13.5% MAM, accounting for most of the detected SAM cases. Nay Pyi Taw presents a more concerning profile, with over half of WRA (55.7%) classified as MAM, and only 42.6% within the normal range. These findings point to generally good nutritional status across most regions, with localized pockets of vulnerability -particularly in Karen and Nay Pyi Taw.

4.14.3 Household food security status

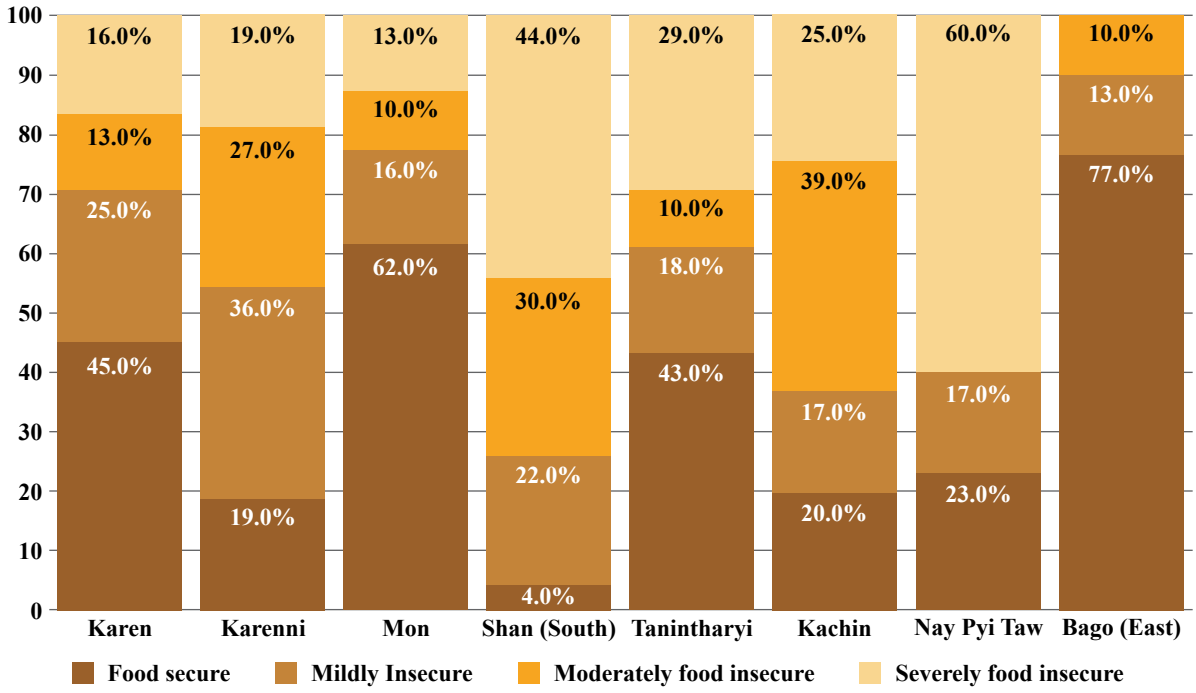

Figure 51. Food insecurity by surveyed areas

Food security was measured using the Household Food Insecurity Access Scale (HFIAS), which is based on respondents' self-reported experiences with food access over the previous 30 days.[23] Only one in three (34.5%) households was food secure, and 40.2% of households experienced moderate or severe food insecurity in the month prior to the survey. The highest levels of moderate or severe food insecurity were observed in Nay Pyi Taw (76.7%), Shan (South) (73.9%), and Kachin (63.0%), where over half of households faced serious challenges in food access. Karenni also showed a significant burden, with 26.7% of households being moderately food insecure and 18.7% of households being severely food insecure. In contrast, Bago (East) stands out with 76.7% of households being food secure, followed by Mon (61.7%).

Figure 52. Two children sharing a meal

CHAPTER 5 CONCLUSION

The 2024 EDHS presents the most comprehensive, population-based assessment of health, well-being, and service access across some of the country's most underserved and hard-to-reach regions since the 2021 military coup. Drawing on data from over 3,000 households and 15,000 individuals, the survey provides a rare and critical view into how communities are coping with overlapping challenges-including economic hardship, service disruptions, and rising health needs.

Findings show that conditions for many households have worsened in recent years. Health gains made over the past decade have been reversed in several areas, with growing needs and reduced access, particularly for women and children. Across nearly every domain-including maternal and child health, mental health, non-communicable diseases-significant service gaps persist, especially among rural and displaced populations. Over half of all births still occur at home, one quarter of postpartum women receive no postnatal care, over 40% of surveyed adults show signs of depression, and food insecurity affects 40% of all surveyed households.

Conflict and displacement continue to shape the availability and accessibility of services. Many households report recent experiences of trauma, including loss and injury, while over three-quarters cite political instability as a current source of stress. Nearly half have experienced income loss, with areas facing a particularly complex mix of displacement, disrupted livelihoods, and constrained service access.

Yet, amid these challenges, the data also highlight the strength and resilience of local systems. In many areas, ethnic and community-based actors remain the frontline providers of health and humanitarian services. These networks-built over decades – have proven central to maintaining access, sustaining care, and anchoring communities. Outcomes tend to be stronger where these systems are well-established, though gaps in coverage and capacity persist as needs continue to grow.

Taken together, these findings call for a recalibration of aid strategies and a deeper investment in equity, inclusion, and local leadership. This data provides a vital foundation for shaping responsive programming, strategic partnerships, and evidence-based policy. Sustained, flexible, and community-centered approaches will be essential-not only to meet immediate needs, but to support recovery and build more resilient systems for the future.

CHAPTER 6 RECOMMENDATIONS

Burma is experiencing a protracted humanitarian crisis marked by conflict, displacement, and deteriorating access to health services-particularly in ethnic and hard-to-reach areas. In this context, there is an urgent need to support inclusive, community-driven health systems that promote equity and resilience. This section outlines practical recommendations for local governance actors, international partners, donors, neighboring countries, and investors to strengthen health services and systems in a conflict-sensitive and community-responsive manner.

Recommendations to local governance actors: Foster inclusive, data-driven, and coordinated local health systems by partnering with EHOs, investing in infrastructure and workforce, and using local data to plan for emergencies and improve access, especially for remote and displaced communities.

Recommendations to the international diplomatic community: Support and protect community-based health systems by engaging directly with local health actors, advocating for humanitarian access and protection under international law, and providing flexible, targeted support to sustain essential health services in hard-to-reach areas.

Recommendations to donors and funding agencies: Prioritize underserved regions by providing flexible, multi-year funding that strengthens local health systems, supports integrated and community-led services, and enables inclusive data, infrastructure, and accountability mechanisms.

Recommendations to neighboring countries: Strengthen border health collaboration by recognizing and working with EHOs and ECBHOs, enabling patient referrals, supporting displaced health professionals, and ensuring inclusive policies that uphold access to care for conflict-affected populations.

Recommendations to foreign investors: Adopt responsible investment practices by conducting conflict-sensitive due diligence, aligning with local development priorities, partnering with community organizations, and supporting social initiatives that enhance health, education, and resilience particularly in affected areas.

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Civil Health and Development Network
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(Karenni State)

Mon National Health Committee

S.S.D.F
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