Fact Finding Report

Indian Public Health Standards

&

Right to Health

A Case Study of

Ziro District Hospital

Lower Subansiri District, Arunachal Pradesh

March 2016

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[2]Sacchidananda Mukherjee et al. *Three Decades of Human Development across Indian States: Inclusive Growth or Perpetual Disparity?* (p.16).

[3]Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. 2015. *RMNCH+A Index: State Dashboard Arunachal Pradesh.* Statistics Wing, Ministry of Health & Family Welfare.

[4]*Ibid.*

[5]Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. 2015. "RRCNES Arunachal Pradesh District wise Health Score Card."

[6]Directorate General of Health Services, Ministry of Health & Family Welfare. *Indian Public Health Standards (IPHS): Guidelines for District Hospitals (101 to 500 Bedded)* (p.33).

List of Abbreviations

- ANM Auxiliary Nurse Midwifery
- ARP Arunachal Pradesh
- ASHA Accredited Social Health Activist
- BPL Women Below Poverty Line Women
- CHC Community Health Center
- DH District Hospital
- DLHS District Level Household and Facility Survey
- ENT Ear, Nose & Throat
- HMIS Health Management Information System
- IIPS International Institute for Population Sciences
- IPHS Indian Public Health Standards
- JSSK Janani Shishu Suraksha Karyakarm
- JSY Janani Suraksha Yojna
- NFHS National Family Health Survey
- NHM National Health Mission
- NRHM National Rural Health Mission
- NUHM National Urban Health Mission
- OKDISCD Omeo Kumar Das Institute of Social Change and Development
- PHC Primary Health Center
- PIP (State) Programme Implementation Plan
- RMNCH+A Reproductive, Maternal, Newborn, Child, and Adolescent Health
- RRCNES Regional Resource Centre for North Eastern States
- SBA Skilled Birth Attendant
- SC Sub Center
- UNFPA United Nations Population Fund
- UNICEF United Nations Children's Emergency Fund
- WHO World Health Organization

"For a middle-income country
of its stature and level of development,
the rate of maternal deaths in India is shocking,
raising multiple human rights issues."[7]

[7] Human Rights Council. 2010. *Annex to the Report of the Special Rapporteur on the right of everyone to the enjoyment of the highest attainable standard of health, Paul Hunt: Mission to India (22 November to 3 December 2007).* United Nations General Assembly (p.20).

1. Introduction

In 2016, India continues to face numerous structural public health problems all throughout the nation, in spite of the considerable progress that has been made in recent years, partly attributable to the successes of newly introduced government programmes and schemes. Amongst the various persisting health problems in India, one of the most pressing – both as a public health and as a human rights issue – is the lack of equal access to basic healthcare facilities. "In India, inequalities in the availability of health care due to socio-economic status, geography and gender persist."[8] In other words, although public health problems are prevalent and worrisome nationwide, their intensity and frequency is often significantly higher for certain groups of people in this country. The respect, protection, and fulfilment of thehuman right to health in India is thus limited towards some people and thereby exclusive towards others. This fact finding report seeks to examine these inequalities in the enjoyment of public health and the underlying human rights violations. The object of study for this report can be narrowed down in the following three ways.

Firstly, with regard to inequality based on geography, this fact finding report investigates access to and quality of healthcare in a highly disadvantaged region of the country: the Lower Subansiri District in the state of Arunachal Pradesh (hereinafter "ARP"). ARP is the least densely populated state in India and also one of the country's most remote states, due to various geographical features which inhibit the easy movement of people, services, and goods.[9]Within the state of Arunachal Pradesh, the district of Lower Subansiri is one of the worst performing districts, in terms of maternal and child mortality and morbidity, according to the state's most recent HMIS data.

"Inhospitable terrain and low population density make rendering of health services rather difficult in Arunachal Pradesh. Though there has been a perceptible improvement in the public health facilities, most of the health care facilities are not well equipped with basic infrastructure like building[s], trained man power, equipment and lifesaving drugs. The existing District Hospitals […] require upgradation in terms of physical infrastructure and essential supply."[10]

Secondly, regarding inequality based on gender, this fact finding report specifically looks into the quality, availability, and accessibility of maternal healthcare facilities in Lower Subansiri District.With an approximate 45,000 maternal deaths per year, the country of India accounts for 15% of maternal

[8] Santosh Mehrota, Neha Kumra, en Ankita Gandhi. 2014. *India's Fragmented Social Protection System: Three Rights Are in Place; Two Are Still Missing.* Working Paper 2014-18, United Nations Research Institute for Social Development (UNRISD) (p.15).

[9]Indian Census 2011. 2011. "List of states with Population, Sex Ratio and Literacy Census 2011." *Census 2011.* http://www.census2011.co.in/states.php.

[10]Department of Planning, Government of Arunachal Pradesh. n.d. *A Development Profile of Arunachal Pradesh.* Itanagar: Department of Planning, Government of Arunachal Pradesh (p.18).

deaths globally.[11]This clear indication of gender-based inequality to access in healthcare warrants a thematic focus on maternal health.

Thirdly, relating to inequality based on socio-economic status, this fact finding report scrutinises public healthcare facilities, in the form of the District Hospital in Ziro (Hapoli). Public district hospitals have the mandate and objective to provide healthcare to the district's entire population, independent of any individual's socio-economic status. The District Hospital in Ziro thus provides a good object of study to inspect the enjoyment of maternal healthcare care for women across socio-economic strata.

In short, this fact finding report will research people's enjoyment of the right to health within a geographically, thematically and institutionally challenging context:

- Geographical focus: Lower Subansiri District, ARP
- Thematic focus: maternal and child health
- Institutional focus: Ziro District Hospital (public healthcare facilities)

[11]World Health Organization. 2015. *Trends in maternal mortality: 1990 to 2015: estimates by WHO, UNICEF, UNFPA, World Bank Group and the United Nations Population Division.* Geneva: World Health Organization (p.xi).

1.1 State Profile: Arunachal Pradesh

One of India's most remote States, Arunachal Pradesh is also one of the country's most sparsely populated States. ARP lies for a large part in the Himalayas, covering a total area as big as 83,743 sq. km and an estimated population of 1,441,716[12]. Almost three-quarters of households in the State reside in rural rather than urban areas[13]. The rugged and undulating terrain in combination with the innumerable rivers and streams make physical transport and communication largely difficult.[14] Infrastructural options arelikewise very limited; ARP does not have an airport and only a minimal connection to the Indian Railway.[15]

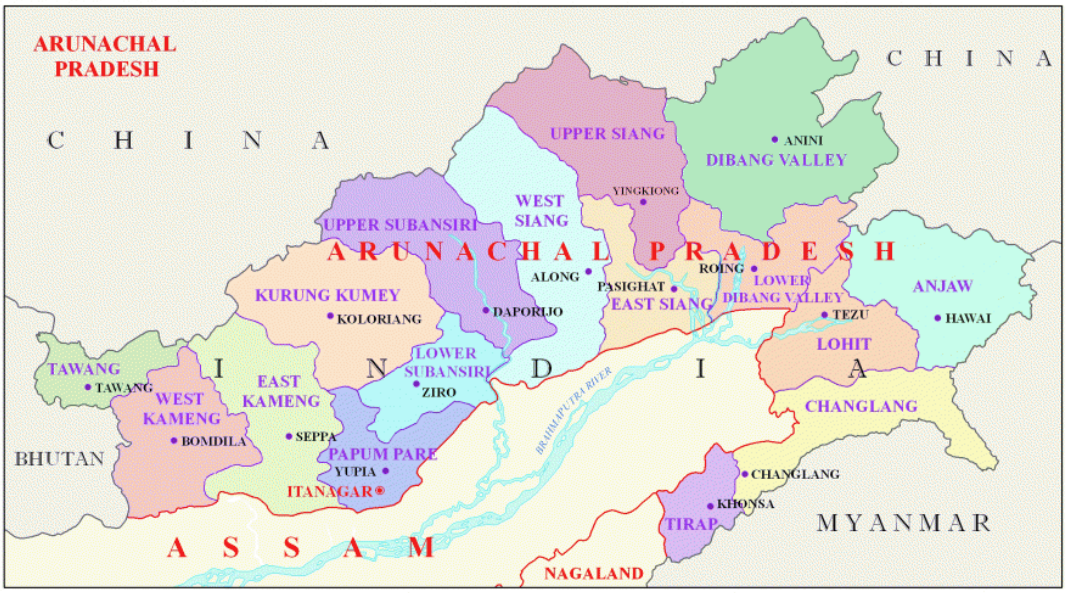


Figure 1 – Map of the State of Arunachal Pradesh

These natural features of ARP determine the State's socio-economic development dilemmas. With its large rural population, agriculture is the primary driver of the economy. Disparities in urban and rural development are significant. Figure 2 demonstrates how ARP has one of the lowest Rural Human Development Indexes of all Indian States. Even more worrisome is the indication that rural human

[12]Health Management Information System. 2015. *HMIS State Factsheet Arunachal Pradesh: Year 2013-14 & 2014-15.* Health Management Information System.

[13]International Institute for Population Sciences (IIPS) and Macro International. 2009. *National Family Health Survey (NFHS-3), India, 2005-06: Arunachal Pradesh.* Mumbai: IIPS (p.2).

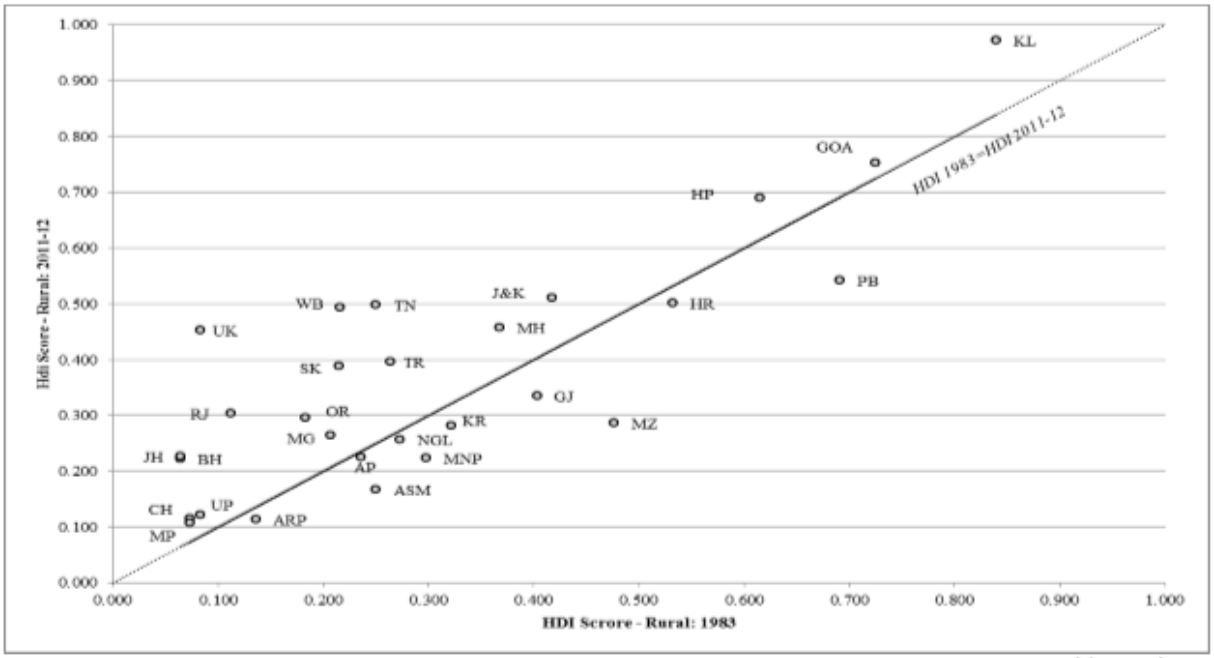
[14]Department of Planning, Government of Arunachal Pradesh. *A Development Profile of Arunachal Pradesh* (p.2).

[15]State Programme Management Unit (NUHM) O/o MD (NHM), Government of Arunachal Pradesh. 2016. *National Urban Health Mission Programme Implementation Plan 2015-2016.* Naharlagun: Government of Arunachal Pradesh (p.6).

development has seen little progress since 1983.[16] Furthermore, ARP has the lowest literacy rate of all North-eastern States, especially amongst rural populations.[17]

For 83% of households in ARP, the public medial sector is the main source of health care (88% of rural households). Among households that do not use government health facilities, the principal reasons given for not doing so are lack of a nearby facility (50%) and poor quality of care (37%). There is a strong correlation between wealth and the use of private facility, indicating that wealthier people are more likely to access private healthcare facilities that are nearby have a good quality of care.[18]Widespread access to wealth, education, and most notably health all contribute to ARP's low performance in terms of human development.

Figure 2: Rural HDI performance of the Indian states (comparison between 1983 and 2011-12)



Source: Constructed by authors

[16]Sacchidananda Mukherjee, Debashis Chakraborty, and Satadru Sikdar. 2014. *Three Decades of Human Development across Indian States: Inclusive Growth or Perpetual Disparity?* Working Paper No. 2014-139, New Delhi: National Institute of Public Finance and Policy (p.13).

[17]Ministry of Development of North Eastern Region. 2011. "Literacy Rates 2001, 2011 - by gender." *Ministry of Development of North Eastern Region.* http://www.mdoner.gov.in/content/literacy-rates-2001-2011-%E2%80%93-gender.

[18]International Institute for Population Sciences (IIPS) and Macro International. *National Family Health Survey (NFHS-3)* (p.24).

From the State level to the local level, the healthcare infrastructure in ARP is organised as follows: State Hospital, District Hospitals (DHs), Community Health Centers (CHCs), Primary Health Centers (PHCs), and Sub Centers (SCs).The table below gives an overview of the quantities of each type.[19]

Type of healthcare facility	Number of facilities
State Hospital	1
District Hospital	14
Community Health Centers	52
Primary Health Centers	117
Sub Centers	286

1.2 District Profile: Lower Subansiri

Arunachal Pradesh is made up of 16 districts. The district of Lower Subansiri is comparatively close to the State capital Itanagar. The topography of the district is mostly mountainous terrain, where the Hill Ranges vary approximately from 1000 to 1600 metres above sea level.[20] The District Headquarter is in the town of Ziro (Hapoli), which ought not to be confused with Old Ziro (located in the same district). Lower Subansiri has a total estimated population of 86,510.[21]

The table below gives an overview of the different health care facilities that exist (and are operational) in Lower Subansiri District.[22]

Type of healthcare facility	Number of facilities
State Hospital	0
District Hospital	1
Community Health Centers	2
Primary Health Centers	7
Sub Centers	18

[19]Health Management Information System. *HMIS State Factsheet Arunachal Pradesh: Year 2013-14 & 2014-15*.

[20]National Informatics Centre, Lower Subansiri Unit, Ziro. n.d. "Physiography." *Official Website of Lower Subansiri District.* http://lowersubansiri.nic.in/html/physiography.htm.

[21]Health Management Information System (HMIS). 2015. *District Factsheet: Maternal and Child Health Indicator (2013-14 & 2014-15): Arunachal Pradesh, Lower Subansiri.* Health Management Information System.

[22]Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. 2015. "RRCNES State Profile: Arunachal Pradesh."

In spite of its relative vicinity to Itanagar, Lower Subansiri is one of the worst performing district in terms of maternal and child healthcare performance. Figures3 and 4, which are based on the most recent HMIS data, show that Lower Subansiri belongs to the bottom two districts in the Overall Index ranking.

When taking a closer look at the performance in the different categories that make up this composite index, it becomes apparent that Lower Subansiri scores worst in providing adequate postnatal maternal & new born care to its citizens. Figure5gives a quantification of this performance.

Figure 4

District	Overall Index	
	2014-15 (Apr-Sep)	2013-14 (Apr-Sep)
Dibang Valley	0.5581	0.5611
Tirap	0.4754	0.544
Upper Siang#	0.5739	0.5333
West Siang	0.4819	0.5032
Tawang	0.4363	0.5008
Upper Subansiri#	0.4259	0.4108
East Siang	0.4538	0.3912
Kurung Kumey#	0.4465	0.5331
Changlang#	0.3841	0.4226

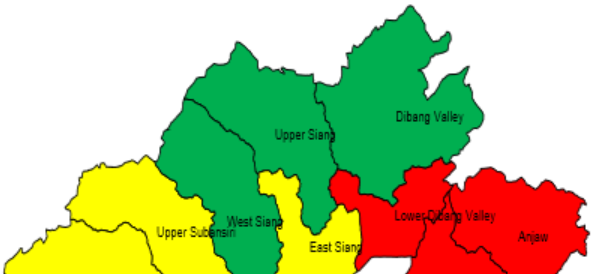


Figure 3 – Table of Overall HMIS Index per ARP District

Rank	District	Composite Index (April 2014-September 2014)				
		Overall Index	Pregnancy care	Child Birth	Postnatal maternal & new born care	Pre Pregnancy/ Reproductive age group
1	Dibang Valley	0.5581	0.3055	0.1487	0.4626	0.3333
2	Tirap	0.4754	0.3729	0.2626	0.4986	0.3333
3	Upper Siang#	0.5739	0.6886	0.5015	0.5963	0.3333
4	West Siang	0.4819	0.5201	0.2382	0.2872	0.3333
5	Tawang	0.4363	0.5059	0.8423	0.2277	0.3551
			5832	0.1557	0.5522	0.3333
			2995	0.2161	0.4296	0.3285
8	Kurung Kumey#	0.4465	0.2815	0.4429	0.3958	0.1495
9	Changlang#	0.3841	0.0317	0.0306	0.3153	0.2697
10	East Kameng#	0.3594	0.2603	0.6071	0.3963	0.1274
11	Papum Pare	0.3429	0.5553	0.1783	0.5395	0.3238
12	West Kameng	0.3796	0.5539	0.195	0.6504	0.3333
13	Lohit#	0.33	0.6522	0.4672	0.7243	0.2995
14	Lower Dibang Valley	0.3227	0.3157	0.3585	0.5759	0.4267
15	Lower Subansiri#	0.1648	0.4891	0.3582	0.3106	0.3333
16	Anjaw	0.3304	0.5171	0.6457	0.4873	0.2505

Figure 5 – HMIS Composite Index (April 2014-September 2014) per ARP district

Based on these statistics, it becomes apparent that Lower Subansiri is one of the worst performing districts in terms of (maternal and child) healthcare facilities, within what might be India's most remote and infrastructure-wise underdeveloped States of India. These indications strongly warrant further research about the district's current state of public health facility, as well as an analysis of the key shortcomings in this facilitation from a human rights-based approach.

2. Methodology

In light of the statistical data about both Arunachal Pradesh and Lower Subansiri, which have been presented in the introduction, this fact finding report seeks to investigate the fulfilment of the right to health, in the form of the Indian Public Health Standards, in Lower Subansiri District, ARP.

Seeing as the IPHS are very extensive and encompass a broad range of health-related themes, this fact finding report focuses thematically on maternal health, the rationale for which has been elaborated on in the introduction. Both on the national and international level, maternal health is often referred to as a key component of public health, particularly in the context of developing countries. The reduction of the Maternal Mortality Rate and the Infant Mortality Rate across India is one of the primary goals of the National Rural Health Mission.[23] Various other national health programmes also seek to address and overcome maternal health-related problems.

In addition to a geographic thematic focus, this fact finding report will institutionally focus on the District Hospital in Ziro (Hapoli). This hospital constitutes the principal public health facility in Lower Subansiri and thus plays a crucial role in providing adequate healthcare and in respecting the IPHS Guidelines. For this reason, any fact finding research on maternal healthcare in Lower Subansiri should first of all focus on the Ziro District Hospital.

After having explained the rationales behind the focus points of the fact finding, this report will now elaborate on the Indian Public Health Standards. These standards constitute the central methodological framework for this research, which will be used to assess people's enjoyment of the right to health.

2.1 Indian Public Health Standards

The Indian Public Health Standards were created to improve the quality of healthcare under the National Rural Health Mission (NRHM) throughout India. The performance of facilities are assessed against the set standards The IPHS thus serves as a framework that seeks to enhance uniformity and monitoring of the minimum quality level of care which is necessary for public health facilities on all

[23]National Rural Health Mission (NRHM). n.d. "National Rural Health Mission: Mission Document (2005-2012)."

levels.. Under IPHS, Indian health care delivery is organised at three levels, namely primary, secondary and tertiary, i.e. in the form of PHCs, CHCs and DHs, which also includes sub-centres and sub-district hospitals. IPHS lays down minimum requirements such as healthcare services, staffing, furniture, equipment, infrastructure, medicines, and hygiene, which every single health institution in the country should provide for.

The District Hospital is an essential component of the district health system and functions as a secondary level of healthcare which provides curative, preventive and primitive healthcare services to the people in the district. Every district is expected to have a district hospital linked with lower health facilities, e.g. Sub-district/Sub-divisional hospitals, CHCs, PHCs, and SCs. District hospitals should provide 24/7 emergency services including normal and institutional delivery, essential and emergency obstetric care including surgical interventions like caesarean sections and other medical interventions, safe abortion services, full coverage of treatment for maternal health and diseases, a large variety of diagnostic laboratory testing services (e.g., pregnancy, blood, urine, stool, RTI/STI, malaria, HIV), comprehensive nutrition services, family planning services (including access to a full range of contraceptives), and have an ambulance service.

The IPHS distinguish between essential and desirable services. The former bring DHs to a minimum acceptable functional grade, whereas the latter proposes elements for further improvement.[24]The services include Outdoor Patient Department, Indoor Patient Department, and Emergency Service. In addition, special emphasis is put on New-born Care, Psychiatric services, Physical Medicine and Rehabilitation services, Accident and Trauma Services, Dialysis services, Anti-retroviral therapy, Patient Safety and Infection control norms. As such, DHs should provide both basic healthcare services and certain specialist services which cover the entire district. Furthermore, DHs need to be ready for epidemics and disaster management at all times. In addition, DHs should provide facilities for skill-based trainings for public healthcare workers throughout the district. All health facility staff should thus be trained in standard treatment protocols for institutional delivery, essential new-born care, and the implementation of all national health programs.

In conclusion, the District Hospitalhas three main functions under the Indian Public Health Standards:

- It provides effective, affordable health care services (curative including specialist services, preventive and promotive) for a defined population, with their full participation and in co-operation with agencies in the district that have similar concern. It covers both urban population (district head quarter town) and the rural population in the district.

[24]Directorate General of Health Services, Ministry of Health & Family Welfare. 2012. *Indian Public Health Standards (IPHS): Guidelines for District Hospitals (101 to 500 Bedded).* Directorate General of Health Services, Ministry of Health & Family Welfare (p.4).

- It functions as a secondary level referral centre for the public health institutions below the district level such as Sub-divisional Hospitals, Community Health Centres, Primary Health Centres and Sub-centres.
- It provides wide ranging technical and administrative support and education and training for primary health care.[25]

Finally, these functions are used to realise the following three IPHS objectives for DHs:

- To provide comprehensive secondary health care (specialist and referral services) to the community through the District Hospital.
- To achieve and maintain an acceptable standard of quality of care.
- To make the services more responsive and sensitive to the needs of the people of the district and the hospitals/centres from where the cases are referred to the district hospitals.[26]

2.2 Fact Finding Research

The research for this fact finding report was conducted by a team of lawyers and social activists of the Human Rights Law Network (HRLN), who visited Ziro District Hospital on February 24th, 2016. In addition, other health facilities in the Lower Subansiri were visited during the same week. The findings of these other visits however fall outside of the scope of this fact finding report and will therefore not be discussed here.

The visit to Ziro District Hospital consisted of three main methodological approaches:

- A physical inspection of the district hospital's premises in their current state
- Interviews with healthcare workers at Ziro District Hospital, including but not limited to nurses, specialists, and administrative staff
- Interviews with patients who are sitting in the designated waiting areas and are awaiting medical treatment or consultancy

The identities nor the specific designations are disclosed in the fact finding report for reasons of privacy..

[25] *Ibid.* (p.5).
[26] *Ibid.* (p.4).

3. Results and Discussion

The fact finding research was carried out in accordance to the methodology, as described in the previous chapter. Firstly, some general observations of Ziro District Hospital can be made. Ziro DH covers a total estimated population of 86,510.[27] The hospital has 70 existing beds[28] and is thus a Grade V District Hospital, in accordance with the IPHS Guidelines.[29] This grade determines the specific IPHS provisions that Ziro DH falls under, particularly when it comes to staff capacity and minimal quantities of specialists.

Based on the main observations and outcomes of the fact finding research, the followingfive central elements of concern can be identified:

1. Basic facilities: electricity, heating, waste management and hygiene
2. Infrastructure and ambulance
3. Service delivery and staff capacity
4. Blood bank
5. Maternal care

By combining the findings from the fact finding research with an in-depth academic literature and statistical study, a comprehensive account of these six issues can be given. The results and discussion of each central issue will now be presented one by one.

[27]Health Management Information System (HMIS). *District Factsheet: Maternal and Child Health Indicator (2013-14 & 2014-15): Arunachal Pradesh, Lower Subansiri*.

[28]Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. 2015. "Copy of Annexure I Manpower Requirement: Requirement of Specialists Arunachal Pradesh."

[29]Directorate General of Health Services, Ministry of Health & Family Welfare. *Indian Public Health Standards (IPHS): Guidelines for District Hospitals (101 to 500 Bedded)* (p.5).

3.1 Basic Facilities: Electricity, Heating, Waste Management and Hygiene

Upon physical inspection of Ziro DH was discovered that there is an insufficient delivery of various basic facilities, namely electricity, heating, waste management and hygiene.

3.1.1 Electricity

Informants from the blood bank at Ziro DH disclosed that a set of solar panels have been acquired and operationalised by the blood bank in December 2015. Although these solar panels provide a possible power backup for the blood bank, it was unknown to the blood bank staff – at the time of the fact finding research – whether and how this power backup could be shared with the rest of the DH. Apart from the blood bank solar energy storage facility, there is currently no other power backup available at Ziro DH.[30]

The need for a power backup which covers the entire DH is however very pressing, considering the instable electricity supply in Lower Subansiri.The table below shows how the average number of hours of electricity available in the district has strongly decreased since 1998. This common electricity cut-off in Lower Subansiri also affects the district headquarters of Ziro (and hence the DH), as was experienced on multiple occasions by the fact finding team during its week-long stay in Ziro (Hapoli).

Average Hours of Electricity Available per day in Lower Subansiri[31]			
	2007	2003	1998
Average hours of electricity available	10.48	15.72	19.68

3.1.2 Heating

During interviews with Ziro DH staff members, it became apparent that there are no adequate heating facilities within the hospital's premises. Considering the fact that Arunachal Pradesh has a cold climate during the winter, the lack of heating has two major consequences. Firstly, indoor patients with weak immune systems or a fragile health can face serious obstacles in their recovery or even new health problems due to persistent exposure to the cold. Secondly, the lack of heating facilities strongly discourages people to head to Ziro DH in case of longer hospitalisation. This is especially the case for institutional delivery and postnatal care for women and new-borns. According to the medical staff informants, one of the principal reasons for pregnant women's reluctance to opt for institutional delivery or PNC at Ziro DH is the lack of heating during the cold winter season.

[30]Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. 2015. "Arunachal Pradesh Drug Procurement Overview."

[31]Omeo Kumar Das Institute of Social Change and Development (OKDISCD): Guwahati. n.d. "Baseline Survey of Minority Concentrated Districts: District Report Lower Subansiri." (p.20).

3.1.3 Waste Management and Hygiene

Upon physical inspection of the sanitary facilities at Ziro DH, significant flaws in appropriate waste management were identified. DH Ziro is the only health facility in the district that has an incinerator for disposing of bio-medical waste, as specified norms laid down in the Bio-Medical Waster (Management and Handling) Rules, 1998.[32] However, during the fact finding research, the incinerator did not appear operational. The same is the case for six other DHs across Arunachal Pradesh, where bio-medical waste plants have yet to become operational.[33]

In addition to inappropriate waste management, various premises within Ziro DH also proved to be in a highly unhygienic condition. As stated in the ICSSR District Report of Lower Subansiri in 2008 already on the topic of hygienic facilities: "The overall scenario of the district has been marked by unhygienic and unhealthy practices."[34]

3.2 Infrastructure and Ambulance

Interviews with medical staff at Ziro DH pointed out that the DH has not had an ambulance for more than 15 years. Even though discussions about the provision of an ambulance have been ongoing, the medical staff could not with certainty indicate whether or when a new ambulance will again become available in the foreseeable future. The issue has been raised on multiple occasions by the District Hospital's management, but no significant progress has been made so far towards the acquisition of an ambulance. The Arunachal Pradesh State PIP 2015-2016 states in a similar fashion: "For lifting pregnant women from home to facility arrangement shall be made under JSSK. ASHAs have been trained to identify the danger sights and to make arrangement for transportation. There is no ambulance in District Hospital Ziro. Hence, the hospital is in need of one good ambulance for faster transportation of referral cases with regard to pregnant women, sick new born, old or young patients of all types."[35]

This Flow Chart of the Emergency Department (Figure 6), based on the IPHS

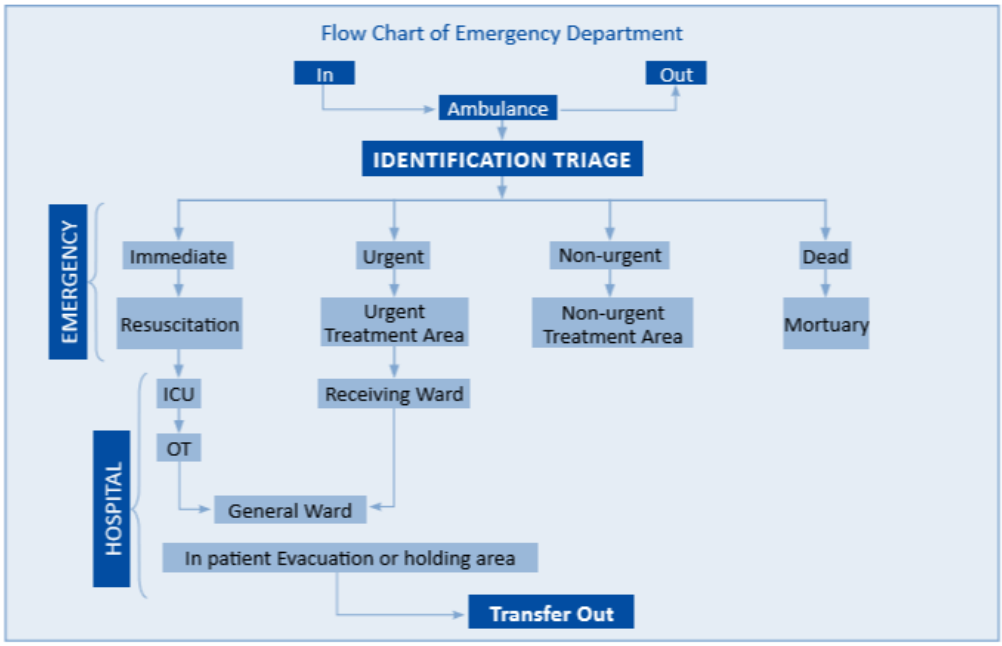


Figure 6

[32] Arunachal Pradesh State
ended 31 March 2

[33] Arunachal Pradesh State
(Social, General a

[34] Omeo Kumar Das Institu
Minority Concen

[35] Arunachal Pradesh State
Document."

Guidelines for District Hospitals clearly demonstrates the central role played by ambulances in the identification triage of emergencies. The absence of ambulance facilities thus structurally disrupts the working flow of the emergency department, as stipulated by the IPHS Guidelines.[36]

The lack of an ambulance at Ziro DH is astounding when one takes into account the fact that as of 30 April 2013 the Government of Arunachal Pradesh has had a total of 142 Government Ambulances, of which 125 are functional.[37] It is not clear why none of these 125 ambulances are deployed at Ziro DH.

Currently, people who reside in Lower Subansiri aresupposed to arrange their own means of travel to Ziro DH in case of emergency, including child delivery. This constitutes a first obstacle in mobility from and to Ziro DH. Consequently, a second obstacle arises due to the appalling state of most roads. "The State is still quite deficient due to inadequate capacity, poor geometric, poor riding quality, weak and distressed bridges and presence of a number of semi-permanent timber bridges and lack of wayside amenities. […] Out of 3863 villages, only 1743 are connected by road."[38] The vast majority of roads are unsurfaced in Lower Subansiri and there is only a very limited connection between the district and the national highway.[39] Furthermore, "[out] of seventeen administrative centres (in Lower Subansiri and Kurung Kumey districts), nine circle (Ziro,Yachuli, Raga, Palin, Sangram, Koloriang, Nyapin,Dollungmukh and Pistana) are connected with the District Headquarter of Lower Subansiri by roads. The remaining eight circles in these two ditstricts (Tali, Pipsorang, Damin, Parsi-Parlo, Chambang, Sarli, Kamporijo and Yangte) are yet to be connected by roads."[40]

Seeing as the Ziro District Hospital is the most advanced public health facility in the entire Lower Subansiri District, patients will need to turn to the Arunachal State Hospital in Naharlagun, if they require certain medical services not offered at Ziro DH. The distance between the Arunachal State Hospital and Ziro DH is 101 km. Due to the bad road quality, this journey can take up to five hours, as has been observed by the fact finding team whilst traveling from Naharlagun to Ziro.The double obstacle that arises from the absence of both ambulances and proper infrastructure thus contributes to a

[36]Directorate General of Health Services, Ministry of Health & Family Welfare. *Indian Public Health Standards (IPHS): Guidelines for District Hospitals (101 to 500 Bedded)* (p.33).

[37]Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. "RRCNES State Profile: Arunachal Pradesh."

[38]Department of Planning, Government of Arunachal Pradesh. *A Development Profile of Arunachal Pradesh* (p.14).

[39]Omeo Kumar Das Institute of Social Change and Development (OKDISCD): Guwahati. n.d. "Baseline Survey of Minority Concentrated Districts: District Report Lower Subansiri." (p.17).

[40]National Informatics Centtre, Lower Subansiri Unit, Ziro. n.d. "Departments at a Glance." *Official Website of Lower Subansiri District.* http://lowersubansiri.nic.in/html/departments.htm.

myriad of limitations to people's access to health. Above all, it inhibits pregnant women to opt for an institutional delivery or to arrive at Ziro DH quickly in case of pregnancy-related urgencies.

3.3 Service Delivery and Staff Capacity

The following tablegives an overview of all the medical staff employed at Ziro DH, based on the information provided during the fact finding research, in combination with the 2015/2016 Arunachal Pradesh State PIP data.

Medical Staff at Ziro District Hospital (as per February 2016)[41]		
Specialisation	**Current number of staff**	**IPHS Guidelines minimal essential manpower requirements**
General Doctor / Medical Officer	11	11
Emergency Medical Officer	1	-
AYUSH MO	2	1
Obstetrics &Gynaecology	2	2
Ophthalmology	1	1
Microbiology	1	0
Pathology	1	1
Lab Technology	2	6
Orthopaedics	1	1
Surgery	1	2
Anaesthesia	1	2
Paediatrics	1	2
Radiology	0	1
Dentistry	2	1
Ear, Nose & Throat (ENT)	0	1
Psychiatry	0	1
Pharmacy	3	4
Staff nurse	13	45
ANM	12	/

All specialisations indicated in red show a significant lack in staff coverage, as measured by the IPHS Guidelines minimal essential manpower requirements. Clearly, there is a strong lack in staff capacity.

[41] Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. 2015. "Maternal Health Document."

The existence of only one Emergency Medical Officer is particularly worrisome. As explained by Ziro DH medical staff members, this medical staff member is on duty 24/7 and is the only person in the entire hospital responsible for immediate emergency care. On first arrival at Ziro DH, there were no employees at the registration counter and the assistance and enquiry counter were likewise empty for at least 1.5 hours in the morning. Furthermore, the critical care area for emergency services was completely abandoned.

Whilst analysing the gaps in staff capacity at Ziro DH, it is important to underline the importance of staff quarters. Staff quarters allow medical staff to be much more efficient and flexible in their work, since they have direct access to the hospital in case a patient needs urgent medical assistance. However, at Ziro DH, there is a significant lack of staff quarters, according to the medical specialists. Even the Emergency Medical Officer does not reside in the staff quarters. In spite of the new construction of DH Staff Quarters in 2007/2008, the staff mobility is thus still lacking considerably.[42]

If one looks at the State level data, it becomes clear that structural gaps in staff coverage exist State-wide. A total number of 1622 staff nurses is required, according to the Arunachal Pradesh State PIP 2015/2016. However, only 429 are in position. Similarly, a total of 183 specialists is required, whilst only 83 specialist positions are currently filled.[43] On the State level, the shortcomings in staff capacity have brought about a discrepancy between equipment and staff, which has resulted in economically unproductive procurement. Several types of equipment were purchased without providing the complement infrastructure and manpower required for their functioning, thus rendering expenditure wasteful.[44]

3.4 Blood Bank

Ziro District Hospital has a building designated as the hospital's blood bank. It was built in 1998.[45] The blood bank staff informed the fact finding team that the building underwent reconstruction in 2006, a process which wouldfinally be completed in 2013/2014. It was however only in December 2015 that the blood bank became fully functional. The blood bank now has a permanent blood bank

[42]Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. 2015. "Lower Subansiri Annexures Infrastructure."

[43]Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. 2015. "Arunachal Pradesh Annexures Human Resources."

[44]Arunachal Pradesh State Government. "Audit Report for the year ended 31 March 2012 (Social, General and Economic Sectors and PSUs): Chapter I Social Sector." (p.4).

[45]Arunachal Pradesh State Government. 2013. *DC inspected district hospital at Ziro.* State Portal of Arunachal Pradesh.

storage facility, whereas previously it could merely be used as an ad hoc blood storage facility.[46] As the blood bank was "facing myriad problems in maintaining its blood bank in the absence of regular electricity supply to the hospital" in 2014[47], the blood bank obtained solar panels which provide a power back-up and allow for the permanent storage of blood donations.

Upon visiting the blood bank during the fact finding research, it however came to the fore that there were zero blood donations present at that very moment. This had largely been the case since the blood bank storage facility's opening in December 2015, as only eight blood donations had been made since then. As explained by the blood bank medical staff, the State Government does not assist in securing blood donations. Therefore, although the blood bank is operational (it is open 24/7), it is not functional at the current moment.

Two methods exist to provide for blood transfusion in case of emergency, e.g. severe haemorrhaging during child delivery. When patients are hospitalised, they need to bring other persons with them who can donate blood in case of emergency. Otherwise, the blood bank will seek to contact past blood donors, whose blood type and contact details were registered upon earlier blood destination.[48] In case of emergency, they will be asked for their availability for immediate blood donation. At the time of the fact finding research, four full-time employees were working at the blood bank: one pathologist, one lab technician, and two nurses.[49] In spite of the blood bank's considerable staff capacity, no awareness raising campaigns were being carried out by the blood bank's staff. A long-term strategy to attract more blood donations seems largely absent, though vital for the successful functioning of the blood bank in the future.

It is evident that there are currently no stable methods of supplying blood. This is even more consternating, given the fact that the Ziro DH blood bank is the only blood bank facility in the entire Lower Subansiri district. The closest other blood bank can be found at the Arunachal State Hospital in Naharlagun, which lies at 101 km distance from Ziro (Hapoli). Moreover, the need for a stable blood storage facility is very pressing all throughout the country. "Anaemia is a major health problem in India, especially among women and children. Anaemia can result in maternal mortality, weakness, diminished physical and mental capacity, increased morbidity from infectious diseases, perinatal mortality, premature delivery, low birth weight, and (in children) impaired cognitive performance,

[46]DNA India. n.d. *Arunachal Pradesh find difficult to run blood bank due to power shortage.* http://www.dnaindia.com/india/report-arunachal-pradesh-finds-difficult-to-run-blood-bank-due-to-power-shortage-2008097.

[47]*Ibid.*

[48]*Ibid.*

[49]Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. 2015. "Blood Transfusion Service Narrative."

motor development, and scholastic achievement."[50] In Arunachal Pradesh. 56.7% of all women have anaemia and 61.7% of all pregnant women suffer from anaemia. 5.7% of pregnant women have severe anaemia.[51] An average of 35 normal deliveries per month take place at Ziro DH.[52] For all these pregnant women, there is no functional blood storage available. In case of urgent delivery complications, they will thus be completely dependent on the coincidental availability and willingness of a matching blood donor. "MMR [and] IMR could be remarkably reduced by providing blood transfusion facility at least at […] district level. Strengthening infrastructure to existing blood banks and requisite training provided to existing manpower without recruiting new HR could improve blood banking system and transfusion service in Arunachal Pradesh."[53]

3.5 Maternal Health

As explained in the introduction chapter, Lower Subansiri is one of the worst performing districts in Arunachal Pradesh, in terms of maternal and child health. Before discussing the main outcomes of the fact finding research in this regard, it is worth to first give some more statistical information to illustrate the current state of maternalhealthcare in Lower Subansiri. Extensive data on the 2015/2016 HMIS Key Indicators on both District and State Level gives the most relevant and up-to-date data in this regard.

3.5.1 Antenatal Care (ANC)

The percentage of women in Lower Subansiri who register for antenatal care during their first trimester is only 37.4%. Furthermore, solely 38.3% of pregnant women receive the recommended total of three ANC check-ups, which constitutes full antenatal care.[54]

Quality antenatal care is of major importance to improve maternal healthcare and to prevent maternal deaths in India. "Antenatal care (ANC) is the systemic supervision of women during pregnancy to monitor the progress of growth of the baby and to ascertain the well-being of the mother and the child.

[50]International Institute for Population Sciences (IIPS) and Macro International. *National Family Health Survey (NFHS-3), India, 2005-06: Arunachal Pradesh* (p.20).

[51]International Institute for Population Sciences. n.d. *District Level Household and Facility Survey (DLHS-4): State Fact Sheet Arunachal Pradesh (2012-2013).* Ministry of Health and Familiy Welfare.

[52]Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. "Arunachal Pradesh Drug Procurement Overview."

[53]Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. "Blood Transfusion Service Narrative."

[54]Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. 2015. "Performance of Key HMIS Indicators for Arunachal Pradesh."

A proper antenatal check-up provides necessary care to the mother and helps identify any complications of pregnancy such as anaemia, pre-eclampsia and hypertension etc. in the mother and slow/inadequate growth of the child. Antenatal care allows for the timely management of complications through referral to an appropriate facility for further treatment. It also provides opportunity to prepare a birth plan and identify the facility for delivery and referral in case of complications".[55]Thus, maternal deaths can be prevented if a pregnant woman receives proper antenatal care

3.5.2 Institutional and Home Deliveries

The ratio of institutional deliveries against the total number of ANC registered pregnant women is only 43% in Lower Subansiri, compared to 59.8% for the whole of Arunachal Pradesh. Of the already undesirably high percentage of home deliveries in Lower Subansiri, only 24.1%is attended by a Skilled Birth Attendant (SBA), compared to a 60.6% State average for Arunachal Pradesh. The percentage of total reported deliveries that can be categorised as safe deliveries is only 85.4% in Lower Subansiri, whereas on the State level this percentage lies much higher at 97.2%.[56]The most common place of delivery is at home, rather than at a public health facility.[57]

These highly troublesome statistics clearly indicate underlying causes for maternal mortality. As stated in the 2014-2018 Working Paper by the United Nations Research Institute for Social Development named *India's Fragmented Social Protection System: Three Rights Are in Place: Two Are Still Missing*, "[a]cross India, high maternal mortality rates are attributable to the large number of non-institutional deliveries."[58] Improving women's access to healthcare facilities for institutional delivery therefore constitutes a major step in the struggle against maternal mortality in India.

3.5.3 Postnatal Care (PNC)

In Lower Subansiri only 47.8% of delivering women receive post-partum check-up within 48 hours of delivery, compared to 56.6% Arunachal Pradesh State average. Moreover, only 31.4% of delivering women in Lower Subansiri get a post-partum check-up between 48 hours and 14 days after delivery.[59] One of Arunachal Pradesh' State targets for 2016/2017 is to receive a total of 220 woman per year

[55]Ministry of Health and Family Welfare. 2010. "Guidelines for Antenatal Care and Skilled Attendance at Brith by ANMs/LHVs/SNs."

[56]*Ibid.*

[57]International Institute for Population Sciences. *District Level Household and Facility Survey (DLHS-4): State Fact Sheet Arunachal Pradesh (2012-2013).*

[58]Santosh Mehrota et al. *India's Fragmented Social Protection System: Three Rights Are in Place; Two Are Still Missing* (p.12).

[59]Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. "Performance of Key HMIS Indicators for Arunachal Pradesh."

post-partum check-up within timespan of 48 hours to 14 days after delivery.[60] However, according to HMIS 2014/2015, this number is still only 114. [61]

The first 48 hours of the post-partum period, followed by the first one week, are the most crucial period for the health and survival both of the mother and her new-born child. Most of the fatal and near-fatal maternal and neonatal complications occur during this period. Evidence has shown that more than 60% of maternal deaths take place during the post-partum period.

The combination of these three factors plays a determining role in the overall state of maternal health: good-quality and accessible ANC, institutional (or assisted home) deliveries, and PNC.According to the State's technical strategiesunder the 2015/2016 PIP, patients from around the district are supposed to be referred to DH Ziro in case of complications surrounding ANC or other pregnancy-related conditions.[62] Therefore, DH Ziro – as the main public hospital in Lower Subansiri – carries a large burden to provide quality care for the services of ANC, institutional deliveries and PNC. Moreover, it faces the challenge of improving maternal health standards in this badly performing district.

3.5.4 Analysis of Underperforming Maternal Healthcare in Lower Subansiri

As has just been established, the district of Lower Subansiri underperforms in terms of ANC, institutional deliveries, and PNC. Based on the fact finding research, the principal direct cause for this seems to be an overall reluctance amongst pregnant women, women in labour, and women of a new-borns to get hospitalised at Ziro DH. This is largely based on the other flawed elements in IPHS implementation discussed earlier in this chapter

Firstly, the lack of basic facilities, most notably heating, makes it unattractive for women to remain in Ziro DH for the entire 48 hours after delivery, particularly during cold winters.

Secondly, the lack of functional infrastructure in Lower Subansiri and the long-time absence of an ambulance at Ziro DH strongly inhibit women's mobility to travel to the necessary health facilities, both in case of emergency and in case of general hospital check-up, e.g. ANC.

Thirdly, the structural gaps in staff capacity also dissuade women to visit Ziro DH for ANC, institutional delivery, and PNC.

Fourthly and most importantly, the dysfunctional blood bank at Ziro DH strongly obstructs women's willingness to seek pregnancy-related medical services at the DH. In particular, it dissuades women

[60]Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. 2015. "Lower Subansiri Annexures Service Delivery."

[61]*Ibid.*

[62]Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. 2015. "Arunachal Pradesh Annexures Technical Strategies."

from opting for institutional delivery at Ziro DH, seeing as there are no appropriate structures in place to safely treat emergency situations, e.g. in case of severe anaemia and haemorrhage.

Observations during the fact finding research point out that women can only conceive of three alternatives to overcome the obstacles posed by the lacking health facilities at Ziro DH. However, each of these three alternatives faces new obstacles in return:

- Alternative 1: To opt for home delivery, instead of institutional delivery at Ziro DH
    - *Obstacle: Home deliveries are more susceptible to delivery complications, including maternal mortality and morbidity.*
- Alternative 2: To seek ANC/PNC at private healthcare facilities in the region
    - *Obstacle: Private healthcare facilities are significantly more expensive than government healthcare facilities. For this reason, many people especially in rural areas do not have the financial resources to pursue this option. Moreover, the increasing rate of private healthcare use by pregnant women or mothers of new-born children also points at a more structural public health and human rights problem in India:"[t]he fact that three-quarters of health spending is private contributes to [the persisting inequalities in the availability of health care due to socio-economic status, geography and gender]."*[63]
- Alternative 3: To turn to the Arunachal State Hospital in Naharlagun for ANC/PNC and/or institutional delivery
    - *Obstacle: The poor infrastructure between Naharlagun and Ziro does not allow for quick movement in case of emergency. When it comes to institutional delivery, this alternative would almost require an anticipation of the time and date of delivery. This is not feasible for most pregnant women.*

4. Relevant Provisions under IPHS Guidelines

After presenting and discussing the five central elements of the fact finding research, it is now necessary to link each elements to its relevant provisions under the IPHS Guidelines. These IPHS provisions demonstrate how all the central elements must be present within Grade V District

[63] Santosh Mehrota et al. *India's Fragmented Social Protection System: Three Rights Are in Place; Two Are Still Missing* (p.15).

Hospitals. All the provisions listed here below only cover essential services, rather than desirable services. In other words, they constitute the minimal threshold for district hospital service delivery. Every District Hospital should provide for these essential services listed below.

4.1 Basic facilities: electricity, heating, waste management and hygiene

- IPHS DH List of Essential Services includes: "Electric Supply (power generation and stabilization) [and] Heating"[64]

- IPHS DH Guideline IX) on Physical Infrastructure, Departmental Lay Out, Clinical Services, Intensive Care Unit and High Dependency Wards reads: "[The Intensive Care Unit and High Dependency Wards] will also need all the specialised services, such as […] uninterrupted electric supply […]"[65]

- IPHS DH Guideline XI) on Physical Infrastructure, Departmental Lay Out, Clinical Services, Operation Theatre reads: "[The Operation Theatre] also needs constant specialised services, such as […] electric supply […]."[66]

- IPHS DH Guideline VII) on Physical Infrastructure, Departmental Lay Out, Hospital Administrative and Support Services, Engineering Services reads: "Electric sub station and standby generator room should be provided."

- IPHS DH Guideline VII) on Physical Infrastructure, Departmental Lay Out, Hospital Administrative and Support Services, Engineering Services reads: "Air-conditioning and Room Heating in operation theatre and neo-natal units should be provided."

- National Guidelines on Hospital Waste Management Based Upon the Bio-Medical Waste (Management & Handling Rules, 1998) provide for clear and strict regulations on the management and handling of (bio-medical) waste by public healthcare facilities.

4.2 Infrastructure and ambulance

- IPHS DH List of Essential Services includes: "Ambulance services"[67]

[64]Directorate General of Health Services, Ministry of Health & Family Welfare. *Indian Public Health Standards (IPHS): Guidelines for District Hospitals (101 to 500 Bedded)* (p.6).

[65]*Ibid.* (p.31).
[66]*Ibid.* (p.32).
[67]*Ibid.* (p.6).

4.3 Service delivery and staff capacity

- The Manpower Requirements stipulate the minimum essential manpower required for a functional District Hospital of different bed strengths. Manpower is divided into three categories: Medical (1), Nurses and Para-Medical (2), and Administration (3).[68]*NB: the table on page 20 of this report gives an overview of the IPHS Guidelines minimal essential manpower requirements, which are applicable to Ziro DH.*

4.4 Blood bank

- IPHS DH List of Essential Services includes: "Blood bank"[69]

- IPHS DH Guideline IV) on Physical Infrastructure, Departmental Lay Out, Clinical Services, Blood Bank reads: "Blood Bank should follow all existing guidelines and fulfil all requirements as per the various Acts pertaining to setting up of the Blood Bank."[70]

- Access to blood(transfusion) is categorised as 'Drugs' under Sec 3(b) of D&C Act 1940.[71]Access to safer blood is thus mandated by law.

5. National and International Legal Protections

In addition to the State Government's obligations under the IPHS Guidelines, there are numerous other legal and policy protections which protect the citizens' rights to access healthcare in an equal manner, independent of socio-economic status, geography, gender, and other factors. Four categories of legal protections can be distinguished: constitutional protections, case law, national healthcare schemes and policies, and international legal protections. This chapter

5.1 Constitutional Protections

The Constitution of India has provided various rights to its people, who can avail these rights without any discrimination.

- Under Article 21 of the Constitution of India are guaranteed the right to life and personal liberty, including the right to health and medical assistance, right to live with dignity, right to food, right to a clean environment, and right to adequate drugs, right to be free from torture

[68]*Ibid.* (p.36-37).
[69]*Ibid.* (p.6).
[70]*Ibid.* (p.30).
[71]Arunachal Pradesh State Programme Implementation Plan (PIP) 2015-16. "Blood Transfusion Service Narrative."

and cruel, inhuman, or degrading treatment, and right to emergency health care. The Supreme Court held that preservation of human life is of paramount importance. Failure on the part of a government hospital to provide timely medical treatment to a person in need of such treatment is a violation of right to life guaranteed under Article 21of the Constitution.

- Article 14 guarantees equality before the law and equal protection by the law. The Supreme Court has described gender equality as one of the "most precious fundamental rights guaranteed by the Constitution of India."

- Article 15 prohibits discrimination on the grounds of religion, race, caste, sex or place of birth. It also empowers the state to make special provisions for women and children. While the burdens of pregnancy and childbirth are inequitably borne by women, the ability to reproduce should not increase women's chances of death, disability, or illness. There is no similar cause of death for young men in India. States should ensure and protect the life of a woman.

- Finally, Article 47 provides that the state should ensure the nutrition and the standard of living of its people and improve public health, which guarantees access to medical services, regardless of (socio-economic) status.

5.2 Case Law

The Supreme Court of India and various High Courts have issued orders and judgments to ensure women's reproductive rights, including the right to survive pregnancy, the state's duties and responsibilities to run and maintain health institutions, and to provide all medical services to which every person is legally entitled. The following case laws have set a strong precedent and legal foundation for the improvement of public health in India, in general, and for the protection of maternal and child healthcare in India, in particular.

- In *BandhuaMukti Morcha v. Union of India and Ors*, [AIR 1984 SC 802], the Supreme Court held that "right to live with human dignity' also includes right to "protection of health."

- In *Paschim Banga Khet Mazdoor Samity v. State of West Bengal*, [1996 SCC (4) 37], the Supreme Court held that providing "adequate medical facilities for the people is an essential part" of the government's obligation to "safeguard the right to life of every person." It also held that it is the primary duty of a welfare state to ensure that medical facilities are adequate and available to provide treatment and if the state fails to do so, this constitutes a violation of right to life of the person who suffered from inadequate healthcare.

- In *Laxmi Mandal v. Deen Dayal Harinagar Hospital &Ors.,* [W.P. (C) 8853/2008], the Delhi High Court held that an inalienable component of the right to life is "the right to health, which would include the right to access government health facilities and receive a minimum standard of care. In particular, this would include the enforcement of the reproductive rights of the mother."

- In *Francis Coralie Mullin v. Union Territory of Delhi &Ors.*, [1981 (1) SCC 608], the Supreme Court held that the right to live with dignity and protection against torture and cruel, inhuman or degrading treatment are implicit in Article 21 of the Indian Constitution.

- In *Parmanand Katara v. Union of India &Ors.*,[1989 SCR (3) 997], the Supreme Court held that Article 21 of the Constitution casts the obligation on the state to preserve life. Every medical practitioner's duty is to treat emergency cases with expertise and never refuse to offer treatment for such cases.

- In *Consumer Education and Research Centre v. Union of India,* [1995 SCC (3) 43], the Supreme Court held that Article 21 of the Constitution of India includes a fundamental right to health, and that this right is a "most imperative constitutional goal".

- In *Sandesh Bansal vs. Union of India &Ors.*,[W.P. (C) 9061/2008] the Indore High Court concluded that timely health care is of the essence for pregnant women to protect their fundamental rights to health and life as guaranteed under Article 21 of the Constitution of India. The Court held, "…[w]e observe from the material on record that there is shortage not only of the infrastructure but of the man power also which has adversely affected the effective implementation of the [National Rural Health Mission] which in turn is costing the life of mothers in the course of mothering. It should be remembered that the inability of women to survive pregnancy and childbirth violates her fundamental rights as guaranteed under Article 21 of the Constitution of India. And it is primary duty of the government to ensure that every woman survives pregnancy and childbirth, for that, the State of Madhya Pradesh is under obligation to secure their life."

5.3 National Healthcare Schemes and Policies

- National Rural Health Mission (NRHM) was introduced in the year 2005 to provide effective health care facilities to states with weak health infrastructure. However, NRHM is now covered under the National Health Mission (NHM) in order to expand the health service facility to the entire nation with the objective *inter alia* to prevent and reduce maternal deaths in the country.

- Under the umbrella of NHM, the Government of India introduced Janani Suraksha Yojna (hereinafter"JSY") in 2005 with the objective of reducing maternal and neonatal mortality by promoting institutional delivery among poor pregnant women (Below Poverty Line ["BPL"] Women). It integrates cash assistance with antenatal care during the pregnancy period, institutional care during delivery, and postnatal care during the post-partum period. Under this scheme, cash assistance of Rs. 1400/- is for Rural Area and Rs. 1000/- for Urban Area has been provided to eligible pregnant women for giving birth in a government health facility. Moreover Rs. 500 are given to BPL women who give birth at home. Though JSY works as a safe motherhood intervention under the NHM, which focuses on reducing maternal and neo-natal mortality by promoting institutional delivery among the poor pregnant women, until now safe motherhood remains a major challenge for the Government.

- Janani Shishu Suraksha Karyakarm (JSSK) was launched by the NRHM to improve the health care service by eliminating out-of-pocket expenses of pregnant woman and sick new-born children. Under this scheme, all pregnant women who come for delivery in a public health institution as well as their sick infants are entitled to free transport, free drugs, free diagnostic, free blood, and a free diet up to one year. It is the responsibility of the State Government to properly implement this scheme and to perform timely check-ups for better results.

- To develop the health care sector at the community level, Accredited Social Health Activists (ASHAs) have been introduced. They are the primary, accessible health workers, working for any health-related demands in deprived sections of the population, especially for women and children who find it difficult to access health services in rural areas. The ASHA Programme is expanding across States and has been particularly successful in bringing people back to the public healthcare system. It has also increased the utilisation of outpatient services, diagnostic facilities, institutional deliveries and inpatient care.

5.4 International Legal Protections

In addition to legal protections in the Constitution, case law, and national health schemes and policies, India has signed and ratified various international treaties which provides international legal protections for the right to life, the right to health and other related human rights.. India as a party to these conventions has an obligation to fulfiltheir provisions. The relevant conventions which provide for the right to life and the right to health include the Universal Declaration of Human Rights (UDHR), Declaration of Alma-Ata, International Covenant on Civil and Political Rights (ICCPR),

International Covenant on Economic Social and Cultural Rights (ICESCR), and Convention on the Elimination of All Forms of Discrimination Against Women (CEDAW).

- **Article 25(1) of the Universal Declaration of Human Rights (UDHR)**

  Art. 25(1) of UDHR stipulates that everyone has the right to an adequate standard of living including the right to health, which includes food, housing, and medical care with necessary social services and the right to security in the event of sickness, disability, old age etc.

- **Declaration of Alma-Ata**

  The International Conference on Primary Health Care was held in Alma Ata in 1978 and highlighted the need for urgent action by all governments, all health and development workers, and the world community to protect and promote the health of all the people of the world. It urged governments, the WHO, UNlCEF, other international organisations, multilateral and bilateral agencies, nongovernmental organisations, funding agencies, and all health workers to support a national and international commitment to primary health care. It also garnered technical and financial support for health, particularly in developing countries. The conference called on all the aforementioned to collaborate in introducing, developing, and maintaining primary care in accordance with the spirit and content of this Declaration.

- **Article 12 of the International Covenant on Economic and Social and Cultural Rights (ICESCR)**

  The ICESCR was adopted by the United Nations General Assembly on December, 16, 1966 and entered into force on January 3, 1976. Article 12 of ICESCR establishes: “the right of everyone to the enjoyment of the highest attainable standard of physical and mental health.” This Article lists some of the steps which are to be taken by State parties such as: the reduction of stillbirths and infant mortality; ensuring the healthy development of children; improving environmental and industrial hygiene; the prevention, treatment and control of diseases; and access to medical care for all.

- **Article 10(h) and 12 Convention on the Elimination of All Forms of Discrimination against Women (CEDAW)**

  CEDAW was adopted in 1979 and came into force in 1981. It deals with women’s health, particularly reproductive rights. Article 10(h) states that women have the right to "specific educational information to help to ensure the health and well-being of families, including information and advice on family planning.” Article 12 of CEDAW relates to women's health. It obliges State parties: (1) to "take all appropriate measures to eliminate discrimination against women in the field of health care in order to ensure, on a basis of

equality of men and women, access to health care services, including those related to family planning" and (2) to “ensure to women appropriate services in connection with pregnancy, confinement and the post-natal period, granting free services where necessary, as well as adequate nutrition during pregnancy and lactation.” Article 14 mandates that State protect such rights for rural women: “[t]o have access to adequate health care facilities, including information, counselling and services in family planning.”

India, as a State party of all conventions listed above, has an international legal obligation to implement these provisions to protect and provide its citizens with the right to life along with the right to healthcare and medical treatment.

6. Conclusion

The Ziro District Hospital of Lower Subansiri District has an obligation to provide for the minimal essential services, as stipulated in the IPHS Guidelines for District Hospitals. Asanalysed and argued in this report, the Ziro DH severely lacks in its fulfilment of the IPHS Guidelines,in relation to four central elements of concern: basic facilities (electricity, heating, waste management and hygiene), infrastructure and ambulance, service delivery and staff capacity, and blood bank. The structural problems within these four domains of the IPHS essential servicesall structurally contribute to one central problem: the underperforming maternal healthcare in Lower Subansiri District. All the major statistical sources invoked in this fact finding report are uniform in identifying Arunachal Pradesh and specifically Lower Subansiri District as a highly challenging region when it comes to the struggle for improving quality, availability, and accessibility of maternal healthcare facilities. More specifically, in terms of ANC, institutional delivery, PNC, and other maternal health-related services, the Ziro District Hospital does not satisfy multiple minimum standards set by the IPHS framework, which are legally enforced by a myriad of constitutional protections, case laws, national healthcare schemes and policies, as well as international declarations and conventions.

In this clear case of lacking IPHS performance, the State Government of Arunachal Pradesh has a duty to provide for an immediate and adequate response to improve the healthcare facilities at Ziro District Hospital, at least to a level at which all essential services under the IPHS Guidelines for District Hospitals are provided for. This response should ensure that the quality of and access to healthcare is offered in an equal manner to all people, independent of any person’ssocio-economic status, geography, or gender.

6.1 Recommendations

In order to improve the quality, accessibility, and availability of the essential services – in particular those relating to maternal health – offered by Ziro District Hospital, this fact finding report gives the following recommendations.

Basic facilities: electricity, heating, waste management and hygiene

- To provide an immediate and constant power back-up available for the entire Ziro District Hospital (not only the blood bank)
- To provide permanent heating in all the wards during the colder seasons in Arunachal Pradesh, particularly to accommodate for women prior to, during, and after child delivery
- To make regular use of a functional bio-waste incinerator
- To ensure a waste-free and hygienic environment in and around the hospital's premises at all times
- To ensure clean sanitation facilities for patients and staff members

Infrastructure and ambulance

- To have at least one fully operational ambulance, including all the necessary medical attributes and medical staff
- To contribute to an improvement of infrastructure to and from Ziro (Hapoli) to the rest of Lower Subansiri District
- To enhance the overall physical accessibility of Ziro District Hospital

Service Delivery and Staff Capacity

- To arrange for at least all the minimum essential services, as listed in the IPHS Guidelines for District Hospitals
- To fill all the existing shortcoming in staff coverage, both for general and specialist medical staff positions
- To immediately hire more Emergency Medical Officers (EMOs)
- To enlarge the existing hospital's staff quarters, particularly to accommodate those medical staff members who work at the emergency department of Ziro District Hospital

Blood bank

- To ensure a constant supply and availability of blood in the Ziro District Hospital blood bank's storage facility
- To create a long-term strategy for community engagement and awareness raising for blood donations in the entire district of Lower Subansiri

- To explore new strategies for providing immediate blood transfusion in cases of emergency, possibly in cooperation with other healthcare facilities in the region

Maternal Health

- To enhance the rates of ANC, institutional delivery, and PNC at Ziro District Hospital for women across Lower Subansiri District
- To create comprehensive strategies for preventing maternal and child mortality and morbidity
- To further collaborate with other healthcare facilities (CHCs, PHCs, and SCs) in Lower Subansiri District in order to ensure universal health coverage for all people, particularly pregnant women and mothers of new-born children
- To guarantee equal access to public healthcare, independent of a person's socio-economic status, geography, or gender

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