

Medical Outreach Program for Haiduan Village

A Documentary on IDS of Kuanshan Tzu Chi Hospital

Deep inside the rugged terrain of eastern Taiwan, in a Bunun village in isolation, hides the inspiring tales of Tzu Chi Kuanshan medical team safeguarding the health of its residents. Medical outreaches, treatments, prescriptions, transport, referrals, health education, and home visits, the Tzu Chi members never abandon their mission: the conservation of life and health.



關山慈濟醫院

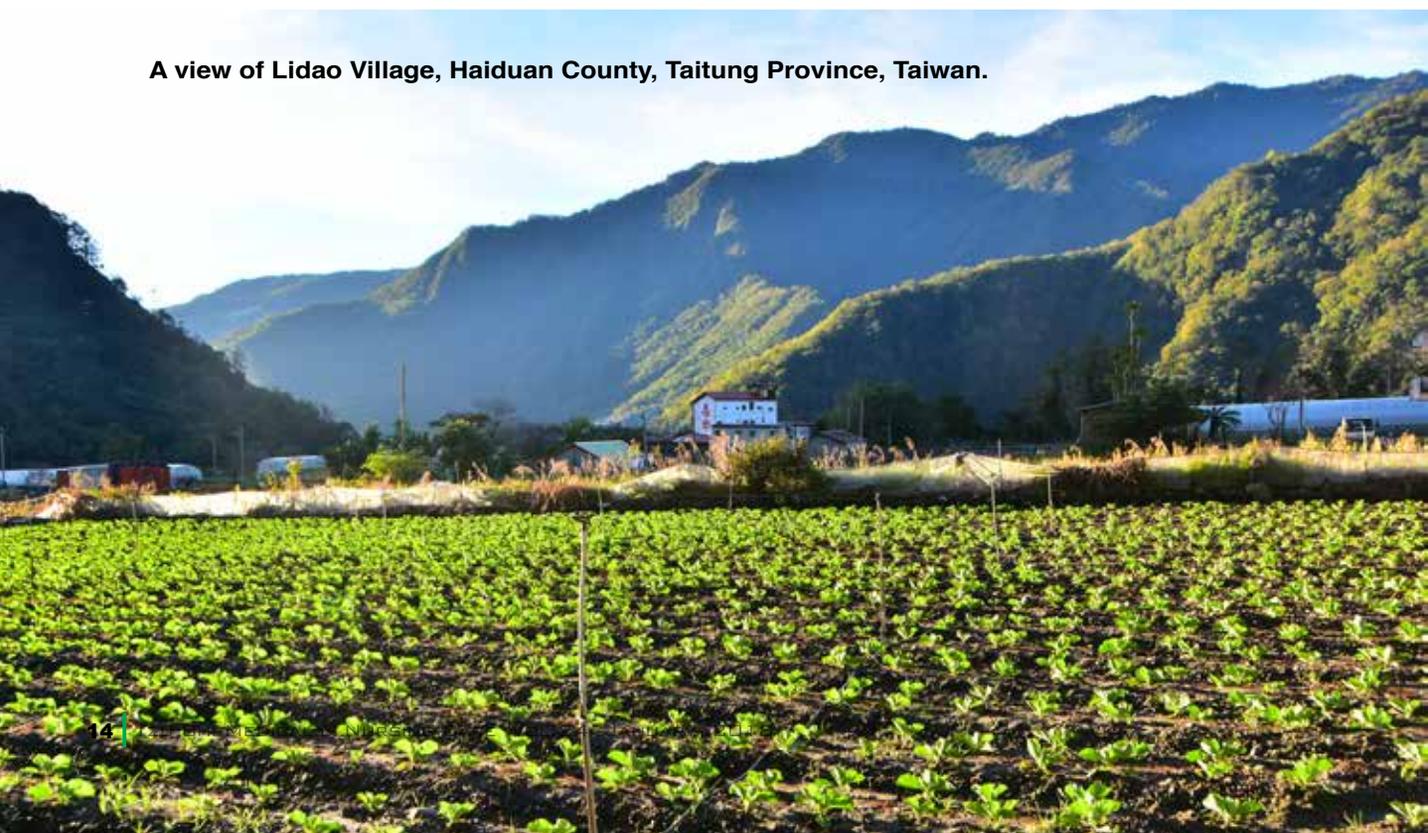
Written by Huang Chang-Bin, Chen Hui-Fang

Healthcare in the Mountains

Hindered by the mountainous landscape of the rift valley in eastern Taiwan and its narrow winding roads, medical care and resources often faces immense challenge finding its way into the village, which, unfortunately, further widens the preexisting healthcare disparity between urban and rural areas. Long traveling hours coupled with limited transportation, the residents are faced with a plight of having health insurance but no healthcare. Their natural optimism, lack of medical knowledge, and an incredible tolerance for pain and suffering, have often led to delay in treatment, causing tragedies that are preventable.

Let us turn the clock back to years ago when Kuanshan Tzu Chi Hospital newly inaugurated in 2000. The presence of this new hospital truly solved the issue of inaccessibility of these mountain residents to healthcare. In March 2001, the Kuanshan Tzu Chi medical team voluntarily assembled a medical outreach team, traversed deep into the mountains, and brought the much needed care and resources to the villagers living 1,000 m above sea level. On September 2001, Hualien and Kuanshan Tzu Chi Hospital, commissioned by National Health Insurance Bureau (now known as National Health Insurance Administration), officially launched the integrated delivery system (IDS), delivering healthcare to people's

A view of Lidao Village, Haiduan County, Taitung Province, Taiwan.



doorsteps that covers emergency and major diseases.

From as early as 2001 when Dr. Chiu Chao-Jong, an overseas Chinese from Myanmar, joined the medical team of Kaunshan Tzu Chi Hospital, the hospital had already begun its outreach program in Haiduan Township, Taitung County. Although Dr. Chiu, known as “the mother who spent her life safeguarding the tribe”, had passed away, her mission has passed on to a new team of medical professionals.

Uninterrupted Healthcare

On Tuesday, October 4, 2016, the sky was bright and clear. Around noon, the medical outreach team led by obstetrician Chang Chih-Fang and Outpatient clinic deputy head nurse Yu Hsin-Yi assembled at the hospital lobby with the driver Liu Chin-Kun from the general affairs, in preparation for the medical outreach to Lidao, Xiama, and Wulu village, Haiduan Township, Taitung County. The trio planned to begin from Lidao that is the furthest away, approximately an hour by car, and work their way down the mountain. A round-trip is about 90 km in distance. By the time they return to the hospital, it would be around 9 pm.

Dr. Chang spoke of his experience supporting the medical outreaches along the villages on southern cross-island highway, and commented that



Lady Chin has been suffering from sustained leg pain for a week. Dr. Chang Chih-Fang examined the swelling and diagnosed her to be localized skin irritation.

helping others was merely doing his job. “Sometimes there are only one or two patients, or even none at all, but I can’t stop coming, or they (the tribe residents) will have no one (doctor).”

Yu Hsin-Yi is a Bunun from Haiduan, and her husband Lidao. Driving up to a secluded mountain top 1,000 m from sea level was to her an opportunity to serve her hometown with her expertise.

As the medical vehicle, a silver SUV, cruised towards the mountains, characters on the side “Kaunshan Tzu Chi Hospital” was particularly noticeable. The two-year old vehicle was donated specifically towards medical outreach. Ever since the launch of IDS, this is the fifth vehicle in operation. The first one was an ambulance, and the other three were vans.

On August 8, 2009, flood and mudslide brought by typhoon morakot devastated the entire Taitung County, resulting in a worst flooding in 50 years.

“Because the bridges and road to Lidao were destroyed during typhoon Morakot, each of us had to carry 5 kg worth of medical equipment, taking the Tianlong trail to (45 min walk) and from (30 min). The road was in such a horrible condition, it left us exhausted. During the twice-a-week outreach, our vehicle was frequently struck by small falling rocks. I remember three years ago, we were on our way down. The sharp pebbles blew our tires out, and we were forced to stay in Lidao overnight. The village head broadcasted to warn the villagers about mudslides below and prohibit everyone from leaving. When the road condition permitted our departure, our tires blew out once again when we drove over a stone. Thanks to our colleague from the general affair who changed the tire,” Yu Hsin-Yi said. “Seven years ago, we had to take a traditional cage hoist as transport up the mountain. It was beyond frightening.” Out of safety concerns, the cage hoist has been dismantled.

In terms of team composition, under the nursing department are “emergency”, “ward affair”, and “public health; and “public health” can be further divided into “outpatient clinic (general affair)” and “community (home care)”. There are 13 registered nurses under “outpatient clinic”, and some would support the medical outreach every Tuesday; there are five registered nurses under “community”, and some would conduct home visits to patients



The outreach medical packs carry supplies that are indispensable in safeguarding the villagers' health.

during the medical outreach every Friday.

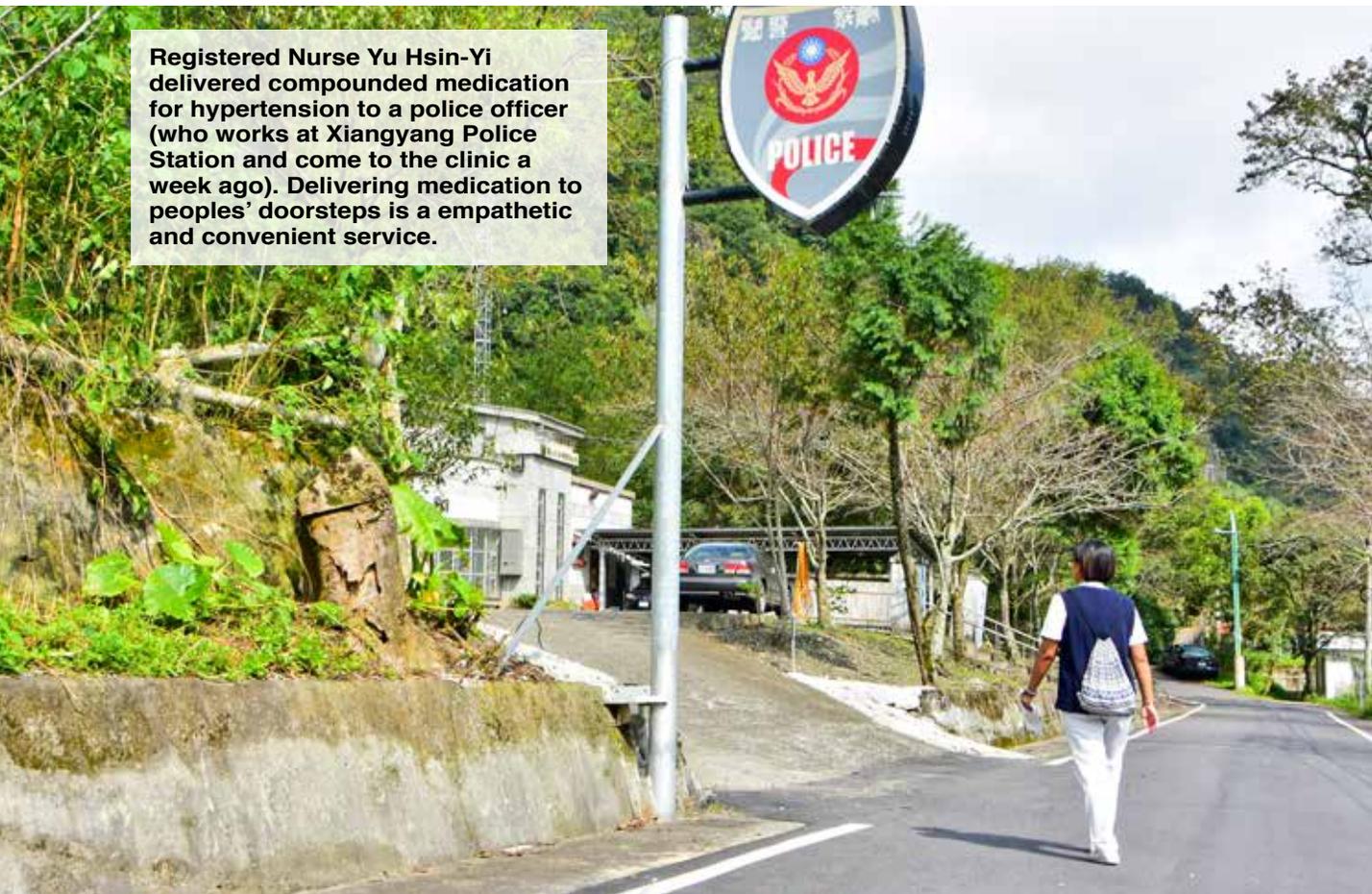
In the southern cross-island medical outreach, Wulu and Xيامa village are combined into one session (3 hours), while Lidao is treated independently. There are current 3 doctors and 7 nurses in rotation. The team is consisted of Family medicine physician Hsu Cheng-Jung, nephrologist Wu Cheng-Teng working Friday shift are in rotation with Obstetrician Chang Chih-Fang working Tuesday shift, together with Bunun infection control manager Ma Hsiu-Mei and outpatient clinic deputy head nurse Hsu Hsin-Yi; registered nurse Chiu Yen-Ting, Huang Hsiao-Ling, Chiu Hsiao-Fen, Chin Hsiao-Yu, and Amis registered nurse Sun Mei-Chi; and 6 general affair staffs as drivers in rotation.



Wearing a gleaming silver eyeglasses frame, with few strands of white hair amid the black, the gentleman-looking Dr. Chang Chih-Fang has an attaching sentiment to the tribal settlements.

October 4, 2016, Tuesday, Detour after Landslide

On July 8, 2016, Typhoon Nepartak laid waste to Taitung County, leaving trails of destruction along the souther cross-island highway that is still visible to this day. On October 10, the IDS team advanced into Lidao village. The road was torn and unlit. When the team arrived at the Liukou open tunnel, the scattered debris on the road from the two typhoons around mid-autumn festival remained visible. Despite the countless road repairs along the way, the Kuanshan medical team carried on their mission.



Registered Nurse Yu Hsin-Yi delivered compounded medication for hypertension to a police officer (who works at Xiangyang Police Station and come to the clinic a week ago). Delivering medication to peoples' doorsteps is an empathetic and convenient service.

After arriving at Lidao, all the equipments were offloaded immediately. Liu Chin-Kun then activated the broadcast system on the vehicle, circled around the village, and announced the news in Mandarin and in Bunun.

The population of Lidao village was approximately 300, Wulu 150, and Xiama 50. The team worked their way downward, serving the villagers, while complying with the traffic regulation announced by the Third District Maintenance Construction Office.

Lady Chin, 37 years old, was the first patient to arrive at the clinic. Dr. Chang diagnosed her condition as localized skin irritation, prescribed medicine for three days, reminded her the time of next appointment and dosage regimen, let registered nurse apply breathable band-aid on the affected area, and gave her several

pieces of gauze for the cream. “Uninang (thank you),” she said, before riding off on her motorcycle with a big smile on her face.

Mrs. Hu in her late seventies came to the clinic after suffering from bruises from a recent fall. The doctor suspected zygomatic fracture and possible intracerebral hemorrhage, prescribed some pain relievers and asked her family to drive her to Kunahsna Tzu Chi Hospital for further examination. Fortunately the follow-up examination revealed that she suffered only flesh wound and no fracture. Mrs. Hu, accompanied by her family, came to the clinic to pay her gratitude.

“While working at the hospital outpatient clinic, if we notice patients from the mountainside and had to wait for a while to see reports or dress wounds, we will place them further forward in queue so



On October 4, 2016 at 2:50 pm, a large-scale landslide occurred in the front of the Liukou open tunnel.



After the massive landslide, Dr. Chang Chih-Fang(left) and staff continued his service to 4 pm before contacting the fire department by the Lidao clinic to escort the medical team to the entrance of the Tianlong trail, and carried on rest of the way on foot.

they can catch the twice-a-day bus (9 am and 2 pm) back home,” Hsu Hsin-Yi said. If tribal elders could not communicate in Mandarin, Hsu Hsin-Yi would act as a translator for Dr. Chang to accurately monitor patients’ conditions.

Ms. Chiu had a habit of chewing betel nuts and drinking alcohol. Few months prior she injured her upper right arm in a motorcycle accident, and several trips to local chiropractor did not help. Dr.

Chang diagnosed her condition as arm pain. The nurses reminded her repeatedly to quit alcohol. The annual health education event held in Lidao and Wulu is the attempt to enhance the preventive medical knowledge of the villagers to preserve their health.

The delivery of medication from hospital to doorstep is a service that the villagers appreciate. In the afternoon, only two villagers from Lidao came to the clinic.

Utilizing the free time when no patients are around, Yu Hsin-Yi took an alleyway to the Lidao police station, and asked an officer on duty to deliver the compounded medication for hypertension to his fellow officer (who works at the Xiangyang police station and came to the clinic a week prior).

At 3:20 pm, the wife of the Lidao village head announced the following through broadcast: "At 2:50 pm today, a serious landslide occurred in front of Liukou open tunnel. Please, everyone, stay at home. The road will reopen in about four to five working days." We were forced to cancel the scheduled clinic at Wulu and Xiama. Despite the announcement, Dr. Chang insisted on finishing his shift to 4:00 pm before contacting the fire department by the clinic to escort our hospital staffs to the entrance of the Tianlong trail, where we continued down the mountain on foot.

As night fell, temperature dropped, and drizzles began to fall. The trail was occupied by overflowing vines and scattered deadwoods, with large debris all over. It was almost an reenactment of the tribespeople seeking medication attention. The doctors in their white shirts, ties, suit pants, and leather shoes, and the nurses in their white uniforms, white shoes, navy blue vests and jackets, all felt weak in their legs, breathless, and covered in sweat. Despite the muddy ground, slippery moss, and those frequent slips, the team, armed with random branches as walking

canes, continued their advances through the dense forest, crossing handrail-less sections while ignoring the risk of falling into the valley below.

"I have already taken this trail four times now," said Liu Chin-Kun. Whenever the road closes, he had to travel up and down the mountain with the nurses, carrying medical equipments on their back. There are several sections along the trail that are frighteningly vertical. When traversing those sections, travelers must keep distance from each other, letting one through at a time, proceed slowly with center lowered. Since the humid ground is covered with sharp debris with no branches nearby to provide physical support, stay too close can be dangerous. Stepping on a loose rock and someone might crack their heads open.

Half an hour into the trail, the sound of rumbling water could be heard from the valley below. After few twists and turns, the sky brightened. The redness of the Tianlong bridge could be seen in the distance, signifying safe passage ahead. As the team placed their canes neatly by the entrance of the suspension bridge, Dr. Chang suddenly said, "let us leave it to the next group going up the mountain!" These roadside branches suddenly transcended into courtesy canes.

As darkness began to veil the sky, the team finally made across the rocking suspension bridge, where, on the other

Despite the muddy ground, slippery moss, and those frequent slips, the team continued their advances through the dense forest, crossing the Tianlong suspension bridge, and returned safely. The entire Hsin-Wu-Lu River is in plain sight.



side, the ride dispatched by Kuanshan Tzu Chi Hospital had been waiting patiently to take them home. Seeing the team made through the trail without a scratch, the hospital staffs were relieved. The medical vehicle that carried the team into the mountain could only stay put by the Lidao clinic, waiting to resume its mission in the mountains once the road opens.

October 11, 2016, Tuesday, Medication Delivery and Roadside Emergency

Around the double ten national holidays, a large-scale landslide along the southern cross-island highway occurred, and was met with torrential downpour, which hindered the repair effort. On the morning of Oct. 11, the road was barely passable. The medical team risked the chance of another landslide and traversed into the mountains to deliver the direly needed medical resources. After finishing inventorying medical supplies, at 12 pm sharp, Lai Chia-Hsun from the general affairs drove the eight-seated medical vehicle, delivering passenger Dr. Chang Chih-Fang and RN Chiu Hsiao-Fen into the mountain.

Signs of the typhoon and its might were still visible along the southern cross-island highway - debris that blanketed the road, and numerous streams of waterfalls were pouring down from the mountainside.



Tianlong suspension bridge.

It was a bumpy ride through these volatile sections. Near Xiama village was a frightening sight of roadbed subsidence a floor in height. The team drove diligently through the hostile terrain and finally arrived safely at the Wulu activity center.

“There is a car accident nearby, let us go and take a look,” Dr. Chang instructed the team after receiving a call from the village officer informing a rollover accident between Xiama and Wulu. By the time they arrived at the scene, an ambulance was present rescuing the couple, 66 year-old lady Hu and 60 year-old Mr. Sung, who fell down the mountain from the accident and suffered from head trauma.

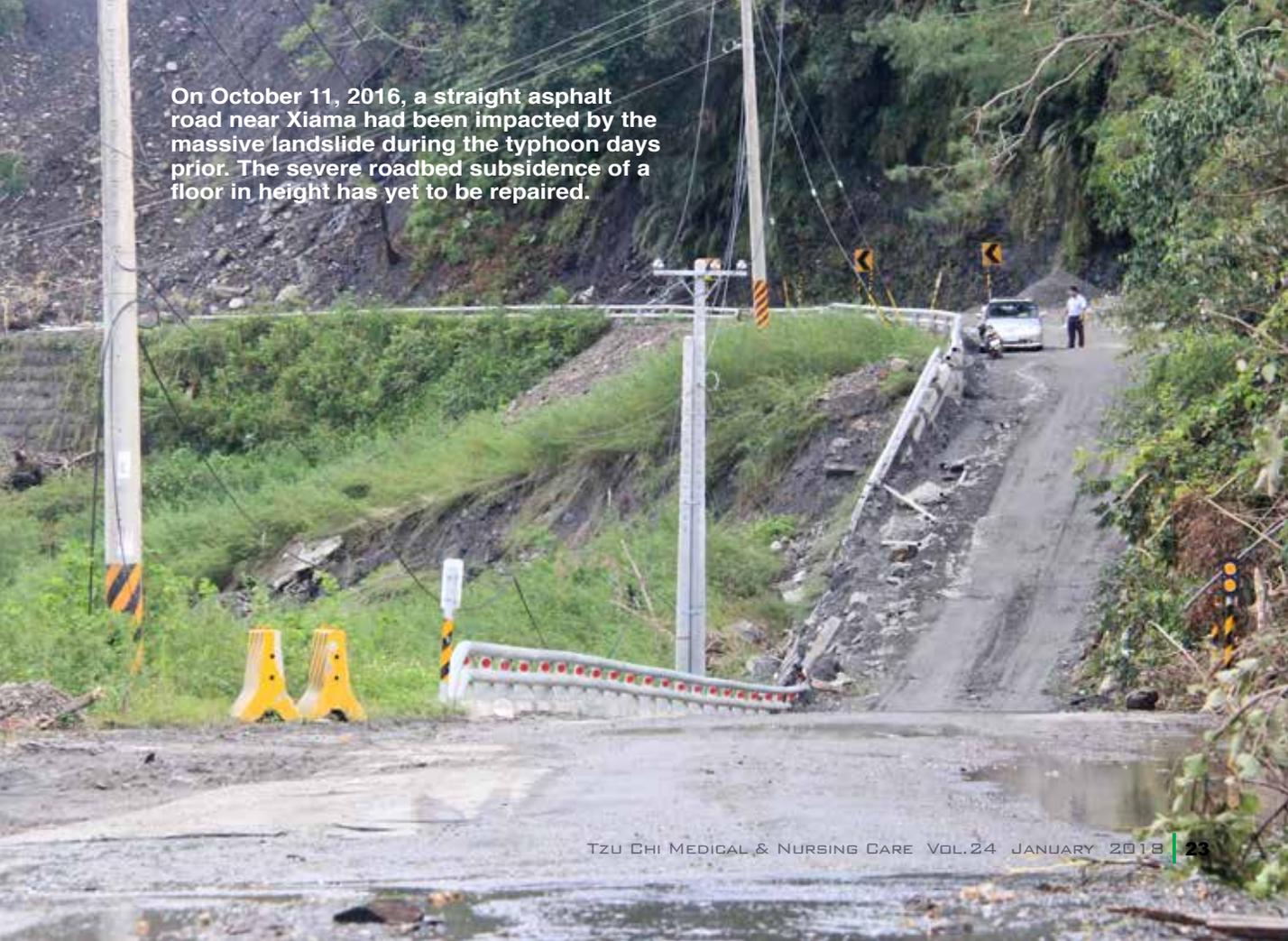
“Does your leg hurt?” Dr. Chang performed a preliminary triage, moved Mr. Sung’s arms and legs gently to

confirm signs of fracture. The registered nurse constantly monitored the patient's consciousness and comforted him by speaking in Bunun. After the second ambulance arrived at the scene, the team handed over the patients and resumed its medical mission at Wulu.

RN Chiu Hsiao-Fen, who was born in the area, had participated in the medical outreach program for more than a decade. Her mother was living alone at Xيامa at the time. After the large-scale landslide on the 4th, she received a call from her mother, "will the hospital team come? I am

almost out of my blood pressure meds, and my stomach has been acting weird." Fortunately the regular outreach service resumed just a week after, freeing her from her concerns over her mother's wellbeing.

A total of 13 patients came to the clinic ever since the road was closed off due to the typhoon, and their symptoms were dizziness, diabetes, hypertension, gout, and flu respectively. A patient living at Lidao could not attend the clinic because of the blocked traffic, but still received his medication nevertheless thanks to the mindfulness of the medical team. The



On October 11, 2016, a straight asphalt road near Xيامa had been impacted by the massive landslide during the typhoon days prior. The severe roadbed subsidence of a floor in height has yet to be repaired.

team, after confirming that they could not reach Lidao, contacted the village head to report the names of patients in need of medication, and then delivered the necessary medication to the Wulu police station, where villagers from Wulu could retrieve them.

The patients from the automobile accident was later transferred to Kuanshan Tzu Chi Hospital. Dr. Wu Cheng-Teng who was on emergency room duty performed

a CAT scan and noticed signs of cerebral hemorrhaging. In a battle against time, the patient was immediately transferred to Mackay Memorial in Taitung for neurosurgery. Lady Hu suffered a broken left arm, fractures in two right ribs, and large contusion on left shoulder. Out of concerns for Mr. Sung and to ease Lady Hu's worries, Dr. Wu completed the transfer procedures in a timely manner for the couple.



On Oct. 11, 2016, as the medical team stationed at Wulu were waiting for patients to arrive, a rollover accident occurred in a section between Xيامa and Wulu. Dr. Chang Chih-Fang and nurse Chiu Hsiao-Fen rushed to the scene to provide emergency treatment.

November 18, 2016, Friday, First to Xيامa, then Wulu

On Friday, the medical team consisted of nephrologist Wu Cheng-Teng, nurse Huang Hsiao-Ling, and Lai Chia-Hsun from the general affairs set on their routine IDS mission into the mountains along the southern cross-island highway. Lai Chia-Hsun, arrived at Kuanshan Tzu Chi Hospital only half year ago, found it particularly meaningful that he could make a living by directly helping patients.

Wu Sheng-Teng, spending his third year at Kuanshan Tzu Chi Hospital and third year in IDS, lamented: "While working at the emergency room of Kuanshan Tzu Chi Hospital, a villager from the tribes along the southern cross-island highway was hit by a fist-sized stone that fractured his thighbone. Think about it, if it falls on his chest, he would have been a goner. Numbers of patients hit by falling debris and sent to the emergency room are quite high. Even local taxi drivers who are familiar with the place can end up with a broken leg!"

The first stop on the 18th was Xيامa village. This small settlement is consisted of three rows of one-storied houses. The team visited 87 year-old Lady Chiu at her home, who had hypertension and received an artificial hip replacement due to degenerative arthritis. The lack of

family support - because her son was an alcoholic - could not provide her the necessary expenses to visit to a hospital, leaving her with poor blood pressure control. The medical team visited her during every outreach to deliver necessary medication, check up on her condition, and provide her with health education.

Lady Chiu walked out of her home on a walker as soon as she hear the team arriving. After settling down, she complained, "my knees hurts! I am old now." "Have you had a cold, cough, or runny nose recently," Dr. Wu asked as he knelt down by her side. When measuring her blood pressure, it appeared that her readings were as high as 215 mmHg. The team decided to take her inside for further examination.

Dr. Wu prescribed Lady Chiu with medications for the hypertension, flu, cough, and inflammation, and had nurse Huang Hsiao-Ling placed it in a medical bag and instruct Lady Chiu on the frequency and dosage for each drug in Bunun. Her oldest daughter came home from Chungli in time to listen to the nurses describing her conditions. The team again reminded lady Chiu and her daughter on her conditions and several precautions before departing to Wulu village.

As the team resumed their travel into the mountain, Dr. Wu pointed out the window as he called out, "Look! Another collapse! Watch that dust clouded the

mountainside...”

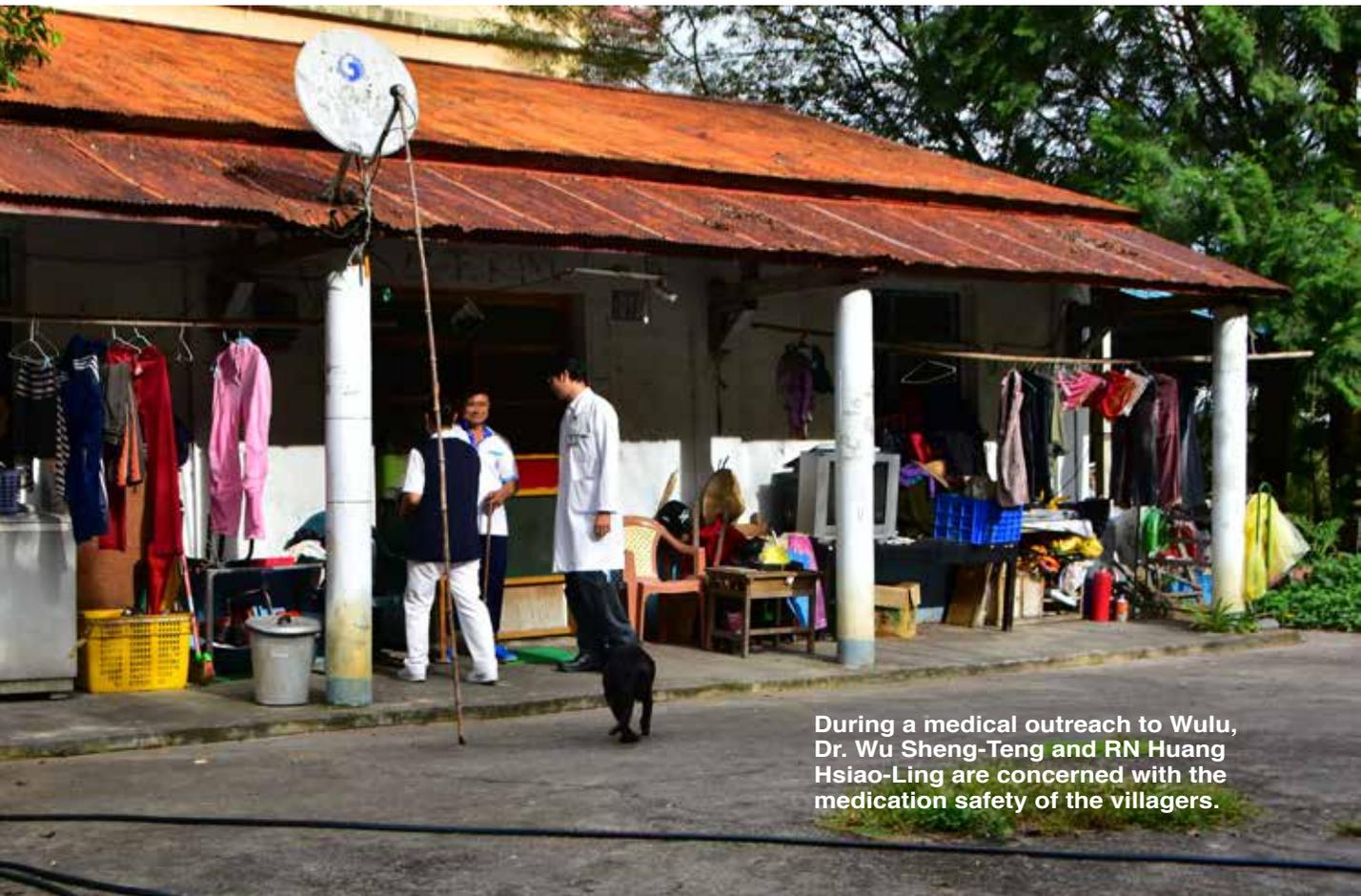
Lai Chia-Hsun turned on the broadcast system as the vehicle approached the village, announcing to the villagers that the medical team had arrived. The collapse the team had witnessed only moments ago occurred not far away from the activity center, accentuating the importance of allocating medical resources into the area.

The first pair of patients at Wulu was Sung Ming-Tang and Hu Ku Feng-Ling, the couple who were injured in the rollover

accident a week ago and was treated by Dr. Chang.

Dr. Wu examined each of their wounds carefully, whether their wrist joints and muscles can move normally or any signs of pain when stretched. He then reminded the couple the importance of follow-up rehabilitation. The warm interaction between him and his patients revealed a genuine sense of empathy and an incredible passion in his work.

Sung Ming-Tang was hospitalized



During a medical outreach to Wulu, Dr. Wu Sheng-Teng and RN Huang Hsiao-Ling are concerned with the medication safety of the villagers.



Top: Lady Chiu stepped out of the house with a walker after hearing the arrival of the team. Dr. Wu measured Lady Chiu's blood pressure with a blood pressure monitor. Bottom: After understanding the conditions of Lady Chiu, the team returned to the medical vehicle to write prescription and dispense medication.

for pneumonia earlier, and Dr. Wu took the opportunity to do a follow-up. The result was an excellent recovery. After the consultation, Dr. Wu and nurse Huang stepped out of the clinic and walked Sung home, wanting to examine the medications he received from other hospitals and their expiration dates.

“The people of Kuanshan are genuine. Aside from the beautiful sceneries, the villagers are hospitable. Practicing medicine in a metropolis would feel like labor, over here, it feels like saving lives. Not only do these people appreciate our efforts, they trust us completely,” said Dr. Wu.

November 18 to 19, 2016, Friday to Saturday, Overnight in Lidao and On Standby

On November 18, just before 6 pm, the medical team arrived at the Lidao clinic. By then, the night already fell. The Hu brothers, still in elementary school, had flu and cough. The brothers were compliant to the doctor’s inquiries and answered accordingly. After receiving the medication, they coughed a few times, walked out of the clinic, and hopped their way into the night.

On November 19 between 6 am to 9 am, only three patients arrived. Mrs. Chen, one of the patients, carried warm homemade pumpkin soy milk to the IDS



The first patients to arrive at the Wulu station were Sung Ming-Tang and Hu Ku Feng-Ying. The couple were emotional when they spoke of the accident. They were both grateful towards the immediate treatment provided by the doctors from Kuanshan Tzu Chi Hospital that saved their lives.



On the eve of Oct. 18, 2016, the team had a brief meal in a grocery store in Lidao before continuing their service.



The Hu brothers, still in elementary school, had flu and cough. After measuring their weight and monitored their ear temperature, the brothers answered every question the doctor asked.

station as a token of gratitude for the care they had given over the years. The drink warmed the team's stomach and revitalized their energy.

From the afternoon of Nov. 18 to 9 am of Nov. 19, the teams serviced one patient in Xiama via home visit, four patients from Wulu, and six patients in Lidao. A total of 11 patients benefited from the outreach. The IDS program has served over 63,166 patients from its launch in September 2001 to Oct. 2016. Through local clinic support, medical outreach, home visits for chronic patient, home care, health education, and

disease prevention.

Watching the elders smile and listen to children sing, the genuine empathy of the doctors and nurses who have been safeguarding the health of the mountain villagers flows naturally from their heart; accompanied by the eight chorus of Bunun, the touch of the stethoscope will never lose its warmth.

The beautiful scenery and passionate hospitality of the villagers of southern-cross-island highway have forged a ever-growing bond between doctor and patient that continues to strengthen.