

Yunnan Province communities "tightly hold the mountains"

村民種植的金竹初有所成,對預防 泥石流開始發揮作用。

The bamboos planted by the villagers grow well and have shown effect on mudslide prevention.

「咬定青山不放鬆,立根原在破岩中。千磨萬擊還堅韌,任爾東南西北風。」清朝詩人兼書畫家鄭燮透過「竹石」 這一首稱頌竹子堅韌不屈的精神的詩,道出竹子能夠抓緊泥土的特性,是防止泥石流和山泥傾瀉的優良植物。

文、圖 香港紅十字會 Text & Photography Hong Kong Red Cross

雲南省紅河州新屏縣新城鄉的團山村及漢泥扒村的山坡上種著大片金竹,蔚然成林,正是香港紅十字會自 二零零六年開始在當地支持「農村社區為本備災項目」的成果。

"Holding tightly the mountains, and rooting to the rocks, tougher and stronger it grows, as from all directions the wind blows." This famous Chinese poem "Bamboo rocks" by Qing Dynasty poet and calligrapher Zheng Xie praises bamboo's virtue of being tough and strong, and also tells its characteristics of holding the soil tight. It is indeed true that bamboo is a suitable plant in preventing mudslides and landslides.

If you go to Tuanshan Village and Hannipa Village at the Xincheng Township of Xinping County, Honghe Prefecture, Yunnan Province, you will see a forest of golden bamboos, which is the achievement of the Community-based Disaster Preparedness (CBDP) Programme supported by Hong Kong Red Cross (HKRC) since 2006.

泥石流陰影下的生活 Living under the threat of mudslides

團山村及漢泥扒村居住著彝、傣、哈尼等少數民族,村民每月的人均收入只有約五十元人民幣,生活貧困,糧食以大米、小麥及粟米為主。兩條村子都被白花龍河貫穿,河的兩岸山高坡陡,每年雨季都有泥石流和大型山泥傾瀉,時常威脅著村民的生命和財產。其中兩次較大的災害,造成了兩村二百多畝(約十三萬平方米)稻田被毀,糧食減產達七萬公斤,直接經濟損失人民幣二十四萬多元,村民的生計受到很大的影響。

Both Tuanshan Village and Hannipa Village are inhabited by several ethnic minority groups including Yi, Dai and Hani. They live in poverty with an average income as low as RMB50 monthly per capita. The villagers mainly feed on rice, wheat and corn. With the Baihualong River passing through these two villages and steep slopes on the riversides, mudslides and massive landslides occur every rainy season, and become the major threat to the villagers' lives and properties. Two major disasters destroyed more than 200 *mu* (about 130,000m²) of rice fields, resulting in a reduction of grain for more than 70,000kg, and a direct economic loss of over RMB240,000. The livelihoods of the villagers were significantly affected.

「無災不成年」的雲南 A disaster-prone province - Yunnan

像團山村及漢泥扒村這些受泥石流和山泥傾瀉威脅的村落在雲南省並不罕見。這個地處中國西南邊陲的省份覆蓋部份雲貴高原,平均海拔二千米左右,全省土地面積中,山區佔八成以上,相對平坦的地區只佔一成左右,大面積的土地高低參差,縱橫起伏。省內雖然降水充沛,但降雨量在季節上和地域上的分配卻不平均,在雨量多月集中時,便會形成洪澇或泥石流災害。這兩類災害通常伴隨發生,互為因果,常對經濟收入較低、自救能力較弱的農民的生命和財產,帶來嚴重的威脅和影響。

根據雲南省民政廳資料顯示,雲南省平均每年有數十萬人受災,需要緊急轉移人口接近十萬人。而且,雲南省農村人均收入偏低,全國排名倒數第三。面對災害頻仍,因本身經濟條件差及收入低,受災農民的抵禦能力薄弱,原來貧困的生活更是雪上加霜。

Tuanshan Village and Hannipa Village are not the only villages threatened by mudslides and landslides in Yunnan Province. Yunnan, located at Southwestern China, covers part of the Yungui Plateau with an average altitude of 2000 meters. More than 80 percent of the province is mountainous and only 10 percent is flat, while large areas are covered by slopes. Although the precipitation is sufficient within the province, it is unevenly distributed seasonally and geographically. When the rainfall is too much in a particular area, floods or mudslides are easily triggered. These two types of disasters often occur at the same time and have a causal relation, seriously threatening and affecting the lives and properties of those farmers with low income and low self-help capacity.

According to the Department of Civil Affairs of Yunnan Province, hundreds of thousands of people suffer from different types of disasters in the territory every year, and the annual average number of persons requires emergency evacuation is nearly 100,000. Moreover, the average per capita income of the rural population in Yunnan is generally low, ranking the third lowest nationally. Facing frequent disasters, the disaster-affected farmers have little recovery capacity due to poor economic ability and low income. Thus, they become more and more vulnerable to disasters.

防災項目傳揚「互助」精神 Promoting mutual support through CBDP programme

針對雲南省山多和地質災害多的特點,香港紅十字會 二零零六年起支持雲南省紅十字會開展「農村社區為本備 災項目」。紅十字會代表與村民一起推行切合當地需要的 減災工程,並透過培訓以提高農村社區備災防災的意識及 自救能力。整個過程鼓勵村民參與其中,從而提升社區整 體的備災防災能力,長遠減少自然災害帶來的損失,保障 村民的生命財產。

In response to Yunnan Province geologic settings and hazard diversity, HKRC has been supporting the Yunnan Provincial Red Cross CBDP Programme since 2006. Red Cross representatives work together with the villagers in implementing mitigation projects which meet local needs, and raise awareness and enhance self-help capacity on disaster preparedness in rural communities via trainings. The programme encourages community participation throughout the process, in order to enhance disaster preparedness capacity of the community, and in a long run, reduce the loss caused by natural disasters as well as protect human lives and properties.





▲已學習備災及急救知識的村民項目管理小組成員,在村民培訓中教授村民急救知識,以提高整體村民的自救能力。

Members of the Villagers Project Management Group who have learned disaster preparedness and first aid knowledge, disseminate first aid knowledge to fellow villagers in order to enhance the overall self-help capacity.

▲村中的男女老少也參與備災培訓,增加自己的防災知識。 Villagers join the Disaster Preparedness Training to enhance their knowledge on disaster prevention.

種植金竹防災

Preventing disaster by golden bamboo plantation

香港紅十字會及雲南省紅十字會協助兩村村民進行「社區易受損性及能力分析」,一起找出村內的災害危機及解決方法。由於兩村村民都同樣希望減輕泥石流災害的禍患,在考慮到村民自己的能力等相關因素,決定在村內種植金竹,以抵禦泥石流可能帶來的禍害及損失。

HKRC and the Yunnan Provincial Red Cross assisted the villages in conducting Community Vulnerability and Capacity Assessment, and jointly identified potential disaster risks and relevant solutions. Since the villagers of the two villages all wanted to reduce the devastating impact of mudslides, after considering their own capacity, it was decided that a golden bamboo planting project would be launched to minimize the possible loss and impact caused by mudslides.



围山村位於高山陡坡下,過去每年雨季時都發生泥石流 沖毀大量田地。

Tuanshan Village is located at the mountainside affected by mudslides which destroyed massive farmlands during every rainy season.

項目由計劃、實施至完成後的管理,均由村民投票選出的「村民項目管理小組」成員負責,香港紅十字會則提供培訓予管理小組,加強他們的項目管理知識和技巧,並協助制定小組管理職責,使小組能按職責開展工作,例如由「項目管理小組」確定各農戶的種植面積,在「公開、公平、公正」的前提下,張榜公佈種植分配計劃,再由「項目管理小組」與農戶簽訂協議書,確保每戶群眾都有份參與項目建設。這種方法能確保村內不同民族、性別和年齡的人士都有機會全程參與項目的計劃、實施和管理。

種植金竹前,兩村每年都有發生泥石流和山泥傾瀉,密度高達每年 二點四次。自二零零七年完成金竹種植後,兩個村落的植被覆蓋率有所 提高,種植區內的泥石流和山泥傾瀉明顯減少,如二零零九年只發生一 次泥石流。同時,金竹亦有效地改善村子周邊的生態和居住環境,保障 兩村合共二百多戶、共七百多人的生命和農作物的安全。 受助農村的婦女組在當地紅十字會的指導下透過「社區易受損性及能力分析」,了解社區的備災需要及能力。
Under the guidance of local Red Cross, a women group of beneficiary village conducted "Community Vulnerability and Capacity Assessment", to understand the needs of disaster preparedness and the capacity of the community.



From project planning, implementation to maintenance after project completion, the golden bamboo planting project was managed by a Community Project Management Group which was elected by the villagers themselves. HKRC provided training to the project management group on relevant skills and knowledge, as well as assisting them to develop their own term of reference, to ensure the work was done accordingly. For instance, after the management group has identified the size of planting areas of each villager, the group would announce the allocation plan of golden bamboo planting project under the principle of openness, fairness and impartiality. The management group would then sign an agreement with each villager to ensure everyone in the village could participate in the project. These practices ensured every villager's participation in the whole process of project planning, implementation and management, regardless their ethnic group, gender and age.

Before the launching of the golden bamboo planting project, the two villages have been suffering from landslides and mudslides every year, at an average of 2.4 times annually. Since 2007, the plantation project has greatly increased the vegetation coverage in these two villages, and hence reduced the occurrence of landslides and mudslides. In 2009, there was one mudslide there in July. With the plantation of golden bamboos, the living environment and its surrounding areas have also been improved effectively. The safety of both human lives and crops of some 200 households, more than 700 people, are well-protected.



香港紅十字會工作人員與村民一起探討金竹種植方法及管理細節。 A HKRC staff discuss with villagers about golden bamboo planting methods and project management details.

金竹成收入來源

Golden bamboo as new income source

金竹既可減災,亦可增加村民收入。根據項目的預期成效,金竹種植後的第 五年(二零一一年)開始,村民每年平均可在每畝地採收竹子四百根,預計兩村 每年可增加經濟收益共人民幣六十萬元,人均年收入增加人民幣八百餘元。

Apart from disaster reduction, the plantation of golden bamboo can also help increase the income of villagers. According to the project expected outcome, starting from the fifth year (Year 2011) of plantation, villagers can harvest about 400 bamboo per *mu* every year. It is estimated that the annual income of the two villages will increase by RMB600,000 in total, which means the annual per capita income of each villager will increase by more than RMB800.

村落的搬遷危機 Crisis of village relocation

除了團山村及漢泥扒村,香港紅十字會亦於二零零七年到雲南德宏州的芒市 鎮白沙場一社開展「農村社區為本備災項目」。白沙場一社是芒市鎮最偏遠的一 個貧困山區村農村,位於海拔一千八百米,村子依山而建,是一個純漢族聚居的 村莊。零七年底,該村村民每月的收入平均不足七十元人民幣。

Besides Tuanshan Village and Hannipa Village, in 2007, HKRC commenced the CBDP Programme at Baishachang Yishe of Mangshi Township in Dehong Prefecture, Yunnan. Baishachang Yishe is a poor rural community which location is the most remote in the township. Locating in an altitude of 1800 meters, the village is built alongside the mountains, occupied by Han ethnic group. In the end of 2007, the monthly average income of the villagers was less than RMB70.

過去由於村民的過度砍伐,使山林遭到嚴重破壞,加上土質疏鬆,雨季時雨量過多, 洪水暴發易造成泥石流、滑坡等自然災害,迫使村內的十一戶村民需搬遷至其他地方。每年 雨季到來,村落便會嚴重受災,對村民的生命財產構成嚴重的威脅。因此該村曾考慮全村搬 遷,但所需資金極多,且沒有合適地點,最終只有暫時擱置。

Due to excessive logging by the villagers in the past, the forest has been seriously destroyed. Moreover, it is easy to trigger flash floods and hence mudslides and landslides due to the looseness of the soil and excessive rainfall in rainy season. Eleven households were forced to move to other places as a result. The village has been severely affected every year during the rainy season, and the villagers' life and property are also at risk. They therefore had considered relocating the whole village. However, since the resettlement plan would require much capital and there was no appropriate location, it was eventually suspended.

建防洪溝的夢想終於實現

A dream comes true with the construction of flood-prevention drainages

在香港紅十字會的資助及當地村民的參與下,白沙場一社的情況現已截然不同。該村修建了兩條防洪溝,村民更親身參與工程建設,體現了自助互助的精神。建成的防洪溝有效預防了洪水暴發造成的泥石流、滑坡等自然災害,使全村四十二戶共四百多人的生命財產得到保障。村長張正能説:「我們村子多年的夢想,現在終於實現了!如果在這兩年沒能建成這兩條防洪溝,整個村子都要搬遷,香港紅十字會真是我們的大救星!現在大家又把多年來荒廢的茶園、果園重新開墾,今年將是豐收年。」

防洪溝的建成,除可幫助村民預防洪災、泥石流等自然災害外,更讓村貌明顯改變。 洪水不再四處亂流,村裡不再滿佈稀泥,村民出入都方便很多,村內衛生環境也得以改善。 「農村社區為本備災項目」的實施,更增強了村民博愛及奉獻的意識,村民已在村內成立 「紅十字會員小組」,傳揚互助的精神文化,是此項目另一個重要成果。

Moreover, Baishachang Yishe looks completely different now with the financial assistance from HKRC and participation from the local villagers. Two flood-prevention drainages have been built with participation from villagers in the construction process, which has demonstrated the spirits of self-help and mutual help. The completed drainages have prevented natural disasters such as mudslides and landslides caused by flash floods efficiently, and protect the lives and properties of more than 400 people from 42 households. Zhang Zhengneng, the village chief, said, "It's indeed a dream come true. The whole village had to be relocated if the two flood-prevention drainages were not built within the past two years. HKRC is really our great saver! Now we have re-cultivated our tea gardens and fruit gardens which have been abandoned for years. It is going to be a plentiful harvest year this year."

The construction of the flood-prevention drainages has not only helped preventing the natural disasters like floods and mudslides, but also improved the outlook of the village. The flood water no longer flows disorderly and the village is no longer muddy. It is now much more convenient for villagers to move around while the hygienic environment has also been improved. In addition, the villagers are now more aware of the spirit of philanthropy and devotion through implementing the CBDP programme, and thus have set up a Red Cross Unit in the village to disseminate the spirit of mutual help. It is another vital achievement of the programme.



當地紅十字會工作人員查看防洪溝工程的建設材料。

The local Red Cross staff inspects the construction materials of the flood-resistance drainages.



白沙場一社村民親身參與防洪溝的工程建設 體現自助互助的精神。

Villagers of Baishachang Yishe participate in the construction of flood-resistance drainages, demonstrating the spirit of self-help and mutual help.



已建成的其中一條防洪溝,對白沙場一社抵禦 洪災及泥石流發揮了一定作用。

One of the completed flood-resistance drainages helps prevent floods and mudslides in Baishachang Yishe.

持續發展──防災備災的重要 Sustainable development

Sustainable development - the importance of disaster preparedness

造林護坡、挖渠疏洪,都是有效減低山洪和泥石流等災害的方法。二零零六年至今,香港紅十字會在雲南省推行的第一及二期「農村社區為本備災項目」,已持續擴展至四個地級市中的五個縣共十四條農村,透過援助常受自然災害影響的農村社區建設減災工程、提供備災知識的培訓予村民,以及協助設立村民項目管理小組等,已成功增強村民的備災及項目管理能力,使項目完成後仍能在當地社區的推行下持續發揮成效。在當地紅十字會及政府的合作下,項目至今惠及超過七千名村民。

Plantation for slope protection and digging canals for diverting flood water are effective ways in reducing disasters such as floods and mudslides. From 2006 to present, the first and the second phases of HKRC CBDP Programme in Yunnan Province have been expanded to 4 prefectures, with a total of 14 villages in 5 counties. Through supporting disaster reduction projects in disaster-prone rural communities, offering disaster preparedness training to villagers, as well as assisting the setting up of Community Project Management Group, the programme has succeeded in enhancing the villagers' disaster preparedness and project management capacities. Hence, it has been ensured that the programme is able to continue effectively by the communities themselves upon project completion. In cooperation of local Red Cross and government, the programme has benefited more than 7,000 villagers.

自然災害有時無可避免,災後救援及重建對恢復災民的 生活固然重要,但能夠做好災前預防的工作,卻能減低 災害的威脅,大大減少不必要的傷亡。根據首兩期項目 的成功經驗,香港紅十字會計劃繼續推行第三期的「農 村社區為本備災項目」,將項目擴展至更多市縣,讓更 多的農村人民受惠。

Natural disasters are sometimes unavoidable. Post-disaster relief and rehabilitation are crucial in the recovery of the affected population. However, should preventive measures are well taken before any disaster strikes, they would have minimized the threat of disasters and greatly reduced unnecessary casualties. Based on the success of the first two phases of the CBDP Programme, HKRC will continue to implement the third phase by extending it to more prefectures and counties, hence benefiting more villages.