



KOREA TODAY

12
Juche 106
(2017)

Medallion of Mediterranean Socialists Organization 1st Class



Chairman Kim Jong Il received the Medallion of Mediterranean Socialists Organization 1st Class from the Mediterranean Socialists Organization in October 1997.



CONTENTS

3 Kim Jong Un Against Background of DPRK-US Confrontation in 2017

Supreme Leader Kim Jong Un is leading the anti-US showdown to victory through his energetic Songun-based revolutionary leadership.



3

7 Always Among Soldiers

8 International Community's View of DPRK

10 Peace in Korean Peninsula and Songun Politics

11 For the Good of the People

12 Brilliant Life



8

Monthly journal *Korea Today* is printed in English, Russian and Chinese, and posted on the Internet site www.korean-books.com.kp in English, Russian, Chinese, French, Spanish and Arabic.



Front Cover: Producers of 80hp *Chollima-804* tractors of a new type.

Photo by Ra Phyong Ryol



Back Cover: Ryomyong Street at night.

Photo by Ra Jin Hyok

13502 ▷ -78233

Edited by An Su Yong
Address: Sochon-dong,
Sosong District,
Pyongyang, DPRK
E-mail: flph@star-co.net.kp

**© The Foreign Language
Magazines 2017**

- 15 Through Technical Innovation
- 16 Shortcut to Leap in Productivity
- 18 Joy of Tractor Producers
- 20 Bumper Apple Harvest in Kwail County
- 22 Window Farming
- 23 Nano-selenium & Oligosaccharide Capsule
- 24 Woman Doctor
- 25 Breaking New Ground in Cancer Treatment
- 26 Teachers in Van
- 28 Following the Spirit of Heroes
- 30 Nine Consecutive Victories
- 31 *Short Story*
Spring
- 33 *Our Woman Driver*
- 34 Holiday Camps and Sanatoria in Good Operation
- 36 A Coach Runs Full of Beautiful Dreams
- 38 Munsu Rehabilitation Centre
- 40 Eight Famous Scenes on Mt. Paektu (4)
- 42 Eight Views of Pyongyang
- 43 National Intangible Cultural Heritage (13)
Kayagum Making
- 44 Mural Pictures of Golden Hall Disappear
- 45 Royal Tomb of Koryo Newly Discovered
- 46 Infamous for Damaging Global Environment
- 47 American Nuclear Crimes Denounced
- 48 Tragedy of Japan



Kim Jong Un Against Background of DPRK-US Confrontation in 2017



Supreme Leader Kim Jong Un gives guidance to the test fire of ICBM Hwasong 14 in July 2017.



THE YEAR OF 2017 IS DRAWING TO A close. Following the first step in the building up of the nation's nuclear force with the magnificent blast of the successful first H-bomb test of the country last year, the Korean People's Army, under the wise guidance of Supreme Leader Kim Jong Un, decorated this year with historic events that are of great importance in removing the US imperialists' nuclear menaces radically in the anti-imperialist, anti-American confrontation.

This Year's Target: Getting Able to Attack US Mainland

Years ago a Western mouthpiece estimated that the Korean People's Army would complete the programme of equipping itself with mobile ICBMs before long, which would cover the US mainland as a whole in their range. The KPA would be able to scorch military facilities and metropolitan areas of the US completely, the press stated. The prediction has come true.

In his New Year Address 2017 the Supreme Leader of the Democratic People's Republic of Korea stated that his country entered the final stage of preparation for the test launch of an intercontinental ballistic missile.

The world media reported his statement immediately and then focused on the country's ICBM programme.

The DPRK successfully launched a ground-to-ground intermediate-range strategic ballistic missile Pukguksong 2 on a trial basis in February this year. Major media such as the American CNN and AP news agency commented that the DPRK had manufactured a caterpillar-style missile launch vehicle to substitute the tracking-possible foreign launch vehicles, that it employed the cold-firing mode which is a high technology in development of ground-to-ground intermediate-range missiles, that it had acquired a new type of strategic weapon equipped with highly difficult technologies like posture control and guide, interception-avoiding scheme and reentry, that with the attainment of the unexpected technical progress the country was probably able to launch an ICBM, and that Korea was shaking and pressing the Trump administration with the launch of a new-style ballistic missile.

Before the US could get out of the shock, the KPA Strategic Force, in three months, succeeded in the first test-fire of Hwasong 12, a new model of ground-to-ground intermediate-range strategic missile which can carry not only standard nuclear warheads ▶



Striking exercises of the KPA arms and services to cope with war moves of the US imperialists and its vassal forces.





► but also large-size heavy-duty nuclear warheads, and Pukguksong 2 which was soon to be sited for combat—all under the guidance of the Supreme Leader of the country. This meant that the KPA Strategic Force has become able to cover the American Alaska and Hawaii in its range and, more surprisingly, made another step forward toward the ICBM development.

Astounded at the developments, the US imperialists made a fuss about “Korea rising sharply as the enemy” while threatening that it would launch a military attack when it decided Korea crossed the “red line” regarding the test launch of an ICBM.

Giving in to such a threat was the last thing for the Korean army to do, though. On July 4, the American Independence Day, it succeeded in the test fire of the ICBM Hwasong 14, which was followed by another successful test launch of the same missile on July 28. With this the KPA Strategic Force demonstrated its capability for making a surprise launch of ICBMs at any place in any region at any time. What became clearer was that the army has put the total territory of the US in its range of nuclear attack.

Guiding the nation’s programme of nuclear weapons development, Kim Jong Un inspected the Nuclear Weapons Institute in September last and then issued an order to carry out an H-bomb test which was of critical importance in attaining the goal of the final stage of the plan of completing the building of the nuclear force of the nation. According to the order, a successful test was carried out for the ICBM-ready H-bomb, the explosive power of which is adjustable from tens of kiloton to hundreds of kiloton. It is a multi-functional thermonuclear nuke with great destructive power which can be detonated even at high altitudes for super-powerful EMP attack against expansive areas according to strategic goals.

Earlier, some Western media and authoritative experts estimated that if Korea’s Hwasong 14 was mounted with the H-bomb of the megaton level in the warhead, a single missile of its kind would be able to totally scorch 25 percent of the US mainland in no more than 60 seconds. Korea had got the capability of launching a formidable pre-emptive strike by firing amplified-fission bombs and H-bombs in succession, they argued.

A French newspaper wrote: Kim Jong Un fulfilled his promise he made in his New Year Address—he said the preparation for an ICBM trial firing was in the final stage. Korea is emerging victorious in the duel of force. Trump can hardly win. The international community had better learn how to live together with the nuke-armed Korea.

► Targeting Major Bases of Aggression

The Hong Kong-based Phoenix Satellite TV of China commented: The frequent US-south Korea joint military exercises in the Korean peninsula are undoubtedly aimed at overturning the DPRK government by means of invasion and other military modes. The situation of the Korean peninsula in the past eloquently shows that the rehearsals geared to “remove the leadership” of the country and strike Pyongyang would bring nothing but stronger countermeasures from Korea. It is clear enough that as long as there remains the threat to Korea the country will accordingly leave the US in constant instability.

This year the US imperialists conducted Key Resolve, Foal Eagle and Ulji Freedom Guardian joint military drills, which drew much larger strength than those of last year, while sending strategic nuclear bombers quite often to the Korean peninsula for a drill of nuclear bombing as part of the plan of strike against the strategic bases of Korea.

The uninterrupted pursuance of the anti-DPRK policy and dangerous moves for nuclear war on the part of the US and its vassal forces only added to the justice of the Korean People’s Army’s tit-for-tat decision. The KPA Strategic Force drew up and announced a plan of containing and controlling major US military bases in Guam including the Anderson air base by firing four Hwasong 12 intermediate-range ballistic missiles. On a visit to the KPA Strategic Force Command Kim Jong Un declared that if the planned fire of power demonstration was carried out as the US was going more reckless, it would be the most delightful historic moment when the Hwasong artillerymen would wring the windpipes of the Yankees and point daggers at their necks.

When the US and its followers were in the Ulji Freedom Guardian joint military rehearsal in accord with their OPlan 5015, the KPA fired Hwasong 12 missiles toward the north Pacific for an exercise as curtain-raiser of its resolute countermeasures. This was the first step of the military operations of the KPA in the Pacific and a meaningful prelude to containing Guam, an advanced base of invasion.

Following the release of the statement of the spokesman for the KPA Strategic Force and the announcement of the KPA Strategic Force commander, the sales of nuclear shelters soared sharply and pamphlets on emergency rules were distributed in Guam and Hawaii, and the residents of Guam got more uneasy when two of the local radio stations made a mistake of warning them of an emergency. American military experts lamented that the Pacific which was under the control of the American navy

fell into a missile firing ground of Korea and that Japan and Guam, the main bases for dispatch of reinforcement troops to the Korean peninsula in case of emergency, came under the serious and immediate threat.

This year the KPA carried out a tactical drill of the reinforced tank and armoured infantry regiment for winter river-crossing attack, a ballistic missile launching drill of Hwasong artillery units, a KPA tankmen’s competition, a dropping and target-striking contest of KPA special operations battalions, a combat flight contest of the commanding personnel of the KPA Air and Anti-Aircraft Force, a target-striking contest of the special operations units of the Korean People’s Army to occupy islands, especially the military parade and public procession of Pyongyang citizens celebrating the 105th birth anniversary of President Kim Il Sung and a combined fire demonstration of the KPA services in celebration of the 85th founding anniversary of the KPA, which was the largest ever since the KPA was founded. These events fully demonstrated the indomitable spirit and powerful combat capability of the army as well as its determination to annihilate the US imperialists and south Korean puppet forces at a stroke and take south Korea at a go. Meanwhile, a test-fire of a new-type anti-aircraft guided weapon system, a test-fire of ballistic missile equipped with precision guidance system, a test-fire of a new-type ground-to-sea cruise missile and other practices were a clear demonstration of the power of the super-precision, latest and varied means of strike.

In his report to the Second Plenary Meeting of the Seventh Central Committee of the Workers’ Party of Korea Kim Jong Un stated that Korea’s nuclear weapons are a priceless fruit of the Korean people’s painstaking efforts to protect their destiny and sovereignty from the long-standing nuclear threats of the US imperialists, that they are a powerful deterrent that helps safeguard peace and security on the Korean peninsula and in other parts of Northeast Asia and fully guarantees the Korean nation’s rights to sovereignty, existence and development. He pointed out that such a deterrent serves as a treasure sword of justice with which to drive out the nuclear cloud of tyranny, likely to bring the worst catastrophe to mankind, and to ensure the people lead an independent, worthwhile life under a clear and blue sky.

As it has Kim Jong Un as its Supreme Commander who is always victorious in the confrontation with the US imperialists, the Korean People’s Army will remain invincible for ever.

Kim Ye Ryong

Always Among Soldiers

For the Sake of Soldiers

ONE DAY IN AUGUST 2012, SUPREME Commander of the Korean People's Army Kim Jong Un inspected a KPA defence unit of Jangjae Islet located on the southwest front. When the accompanying officers repeatedly entreated him not to go to the islet as the sea weather was bad, the Supreme Commander said that soldiers he loved most were there on the islet and asked who else would go to see them if he did not do. Then he got on a small 27-hp boat to go to the islet.

Telling the officers of the company that he had been longing to see them who were on guard on the islet in the southern tip of the southwest sea, the Supreme Commander looked round the unit. After acquainting himself with living conditions of the soldiers including the supply of electricity, he instructed the officers to concern themselves especially with the soldiers' life, take good care of them and pay deep attention to the work to enable them to be always optimistic and active in military service. Then, after acquainting himself with the state of the supply service for the welfare of the soldiers, he called the wives of the officers over to his side and highly appreciated their efforts to help their husbands.

When it was time for him to leave the islet, the company commander, on behalf of his soldiers, entreated him not to visit such a dangerous place like the islet. But the Supreme Commander mentioned that he did not mind visiting wherever there were soldiers even if it was more dangerous than the islet and earnestly said to the company commander, **"Before leaving the islet I want to ask you company officers to be genuine comrades-in-arms of the soldiers and take good**

care of them like their own elder brothers and sisters should do them.... I entrust Jangjae Islet to you."

Indeed, his inspection of the islet was associated with his warm love and care for the soldiers.

"The Time Spent with Soldiers Is not Regrettable"

January 21 of 2012 was the day of Taehan (the height of the winter cold in a year). That day Supreme Commander Kim Jong Un inspected a KPA company. Looking round the education room of the company he listened to and applauded songs sung by the company officers and advised them to work well with one accord.

In a barracks he said that it was warm enough there and told the officers to strive to ensure the temperature required by the regulations. Then he personally unfolded and felt a blanket and said with satisfaction that he was glad to hear that the soldiers liked the blankets as they were thick and warm.

In the wash-cum-bathroom of the company he himself felt warm water of the bathtub and looked over and over again at the water, saying with joy that the soldiers must be pleased to use warm water.

When he was back out, the sun had already set, and darkness started to set in. But he said that he would look round the mess hall however much time had passed and went on to say, **"I am fond of being among soldiers. The time spent with soldiers is not regrettable."**

Now it was dark, and a very cold wind blew occasionally, but he headed for the mess hall.

Pak Pae Ryong



International Community's View of DPRK

THE YEAR 2017 WITNESSED a serious confrontation between the Democratic People's Republic of Korea and the United States. The Trump administration, sneering at their predecessor's complete failure in its strategy, produced a number of strategies to bring the DPRK into submission, and has run helter-skelter to do "something great."

It mobilized strategic means and forces of aggression enough to carry out a complete war—strategic nuclear bombers B-52H, B-1B and B-2A based in Guam and the US mainland, stealth fighters F-22A and F-35B in the US military bases in Japan, and nuclear-powered aircraft carriers *Ronald Reagan* and *Carl Vinson* which are the US's means of overseas aggression—and waged Key Resolve, Foal Eagle 17 and Ulji Freedom Guardian joint mili-

tary exercises in all parts of south Korea, driving the situation in the Korean peninsula to the doorstep of explosion. At the same time, Washington, using its economic influence on the international market and its dominant position in the international arena, tightened the encircling net of sanctions against and pressure on the DPRK as closely as possible. The neighbouring countries of the peninsula joined the Americans' scheme.

In the environment when other countries might have collapsed one hundred times the DPRK advanced steadfastly and confidently along the road it chose. This has brought the comprehensive national power and strategic position up to a new phase. In the 1990s a well-known geopolitics expert of the United States described some big powers

as the geopolitical chess players in his book, asserting that thanks to the players a new political map would come into existence in the Eurasian continent. The players included the neighbouring countries of Korea.

But the situation has developed contrary to his anticipation. Some time ago an Asian news agency commented that as the level of the DPRK-US confrontation is growing constantly Korea's geopolitical value in the Asia-Pacific region is rising sharply, and that the old landscape in which Korea suffered from one-sided threat is changing.

Early this year the DPRK declared that it would continue to build up its self-reliant defence capability, the pivot of which is the nuclear force, and the capability for preemptive strike as long as the United States and its ▶

► vassal forces keep posing nuclear threat and blackmail and as long as they do not discontinue their war games they stage at its doorstep disguising them as annual events. And it expressed that it would defend peace and security of the state at all costs and by its own efforts, and make a positive contribution to global peace and stability. The policy came into effect.

The country put the US to the disadvantage who is attempting to attain its dominance over the Eurasian continent. In February last it successfully conducted the test fire of the ground-to-ground intermediate-range strategic ballistic missile Pukguksong 2, which was followed by the test fires of a new-type ground-to-ground intermediate-range strategic missile Hwasong 12, which can carry a large-size heavy-duty nuclear warhead, and another Pukguksong 2 before its deployment at military units for action. Until that time the US was simply indulging itself in its threat against Korea that it would deal a military strike when the country was judged to have passed the “red line,” that is, an ICBM test fire.

Korea's countermeasures almost shocked the Americans, though. All the country did—typically, the two test firings of Hwasong 14 ICBMs in July, the complete success in the test of an ICBM-ready H-bomb in September, and launches of Hwasong 12 missiles—were evident indications that any sanctions, military pressure or threat of war could not work on the Korean people. It

was the US that became defensive, and Korea's approach was quite a slap on the American face. All the American endeavours to destroy the DPRK turned out futile, incurring unbearable protest and denunciation from the international community.

The Iranian President Hassan Ruhani stated that the DPRK has acquired nuclear weapons and is testing new kinds of bombs in order to defend itself and that Korea's development of nuclear weapons is thanks to the US. Warning that to threaten a nuclear nation precisely means a very dangerous act of threatening the whole world, he poured his anger on the US that is bringing the situation to the extreme.

The Congolese News Agency denounced the Trump administration for adhering to the stereotyped Korea policy instead of learning a lesson from the strategic failure of their predecessors, while the Cambodian State Radio enumerated special data to disclose that the US itself pushed Korea to have nuclear weapons.

Western media, including the American CNN and Washington Post, the British Reuters news agency and Guardian newspaper, and French AFP news agency, reported that there is no way to check Korea's nuclear buildup, that the landscape of DPRK-US confrontation has changed and that the only choice left for Trump is to approve the nuclear capability of the country.

This is the very reality at the moment. The US that used to employ the nuclear threat and blackmail to deal with the Korean

people has been reduced to the destiny of undergoing every minute of its miserable doom. (The Korean People's Army's Strategic Force made it public that it had accomplished preparations for a surrounding fire against Guam. The successful two ICBM test fires demonstrated that the US comes within the firing range of the Korean People's Army.)

Against this background Trump, addressing a UN session, made a rude, belligerent statement that he would totally destroy the DPRK. The situation is going from bad to worse for the Americans because of Trump who is overwhelmed with the congenital antipathy against Korea. His slogan of “Americanism” has cast the dangerous plight of total destruction over the Americans, going far beyond the grey cloud. Earlier, the Americans made fun of Trump calling him political outsider and political heretic, but now they are suffering every minute of their life from the fear of return to the stone era just because of Trump.

There is a growing voice even among the American politicians for changing the Korea policy to cope with the global military dynamism that has changed completely with the country's strategic status.

A new demand is booming for preparing a new political map of the Eurasian continent. Who will play the main role? The international community is focusing on the DPRK, a small but great country in Northeast Asia.

Kim Yong Un

Peace in Korean Peninsula and Songun Politics

PACE IS AN EVER-GROWING ASPIRATION of humankind. The Korean nation has aspired to peace and reunification more fervently than anyone else. As they have lived suffering from the territorial division and constant danger of war posed by the US and other imperialist forces for over half a century, they are more anxious for peace and reunification than anything else. And Kim Jong Il, the eternal Chairman of the National Defence Commission of the Democratic People's Republic of Korea, was a peerless great man who led the anti-imperialist, anti-US showdown to the victory and defended the supreme interest and sovereignty of the nation from the allied forces of imperialism of the world.

Historically, the US has regarded the Korean peninsula as a breakthrough in its world strategy. The peninsula, which is sandwiched between big powers, has become the most appropriate and advantageous region for them to accomplish their military rule over the Asian continent. The Americans know that the control of the peninsula will help them easily advance to East Asia and then to Russia and Eastern Europe. If they establish dominance over the whole of Korea, they will be able to intensify the military pressure on the countries surrounding the peninsula in a more favourable condition so as to realize its strategic target with ease—this is Washington's calculation. Hence, the Korean peninsula has become the place of the most serious military confrontation and the most dangerous hotbed of a nuclear war.

In the 1990s the world's political landscape changed from the USSR-US confrontation to the DPRK-US one, which was the fiercest ever showdown for the DPRK to defend its destiny and socialism. In the early 1990s the US, elated with the consecutive "victory" in the Cold War and the Gulf War, launched a campaign to subjugate the DPRK at once. To justify its planned war it employed the "nuclear issue" of Korea. It instigated the International Atomic Energy Agency to adopt a resolution on ad hoc inspection of the country while making a propaganda of the "nuclear suspicion." At the same time it waged large-scale Team Spirit joint military exercises to put military pressure on it.

Chairman Kim Jong Il invariably maintained Songun in the anti-imperialist, anti-US showdown in order to safeguard the supreme interest and sover-

ignty of the nation. With a will to return confrontation for confrontation and war for war, instead of any compromise and begging, he saw to it that a semi-war state was declared, which was followed by the country's withdrawal from the Nuclear Non-Proliferation Treaty. As a result, the DPRK-US nuclear confrontation ended up in the publication of the DPRK-US Joint Statement in New York in which both sides agreed to continue dialogue on the equal and fair footing upon the principle that the US respects the sovereignty of the DPRK, does not interfere in its internal affairs and supports the independent reunification of Korea.

Despite the statement, the US's moves to isolate and suffocate the DPRK went from bad to worse. To cope with the situation in which the US's hostile policy reached the extreme the Chairman took new measures to strengthen the self-defensive war deterrent, holding higher the banner of Songun, and wisely led the work to this end.

On October 3, 2006 the statement of the DPRK Ministry of Foreign Affairs declared that the country would have a nuclear test as a new measure to defend the sovereignty and dignity of the nation from the Bush administration's hostile actions. Six days after the declaration the DPRK successfully carried out an underground nuclear test with the wisdom and technology of its own. The complete success in the nuclear test was an auspicious event of historic significance which gave great encouragement and pleasure to the Korean people who had worked hard to build a powerful self-reliant defence capability and a thriving nation century after century. Their desire to live in a peaceful and stable world and achieve ever-lasting prosperity of the nation was thus fulfilled brilliantly.

Through the first underground nuclear test in 2006, and other tests in 2009 and 2013 the DPRK was convinced that it does not need to argue with the US but to defend its sovereignty with its own strength and effort. Now the country is possessed of ICBMs and H-bombs. Now that they have got a firm self-defensive nuclear deterrent, the Korean people keenly feel why Chairman Kim Jong Il blazed the trail of Songun. They pay boundless respect to his patriotic exploits.

Pak Chol Ryong

For the Good of the People

WHEN I SEE PEOPLE FULL OF HAPPINESS while shopping in my Pyongyang Department Store No. 1, I am often moved to tears, feeling an irresistible yearning for Chairman Kim Jong Il who made devoted efforts to provide the people with happy life.

On the Sunday morning of July 10, 2011 (it was several days after the 2nd Pyongyang Department Store No. 1 Goods Exhibition) when we were busy getting ready to open the store, I was informed that Chairman Kim Jong Il was coming to visit my store. I could hardly calm myself down because I had been so eager to see him.

When I reached the hall of the ground floor, the Chairman just entered its entrance. While looking around the exhibition, he paid primary attention to the matter of edible oil of the people. Studying stand after stand, he suddenly asked an accompanying official where the edible oil stand was. Hearing that it was on the first floor the Chairman said that he would see it first, and headed for it. Actually, we only displayed perilla oil for the exhibition. Approaching the edible oil stand the Chairman turned his eyes upon us, and said that edible oil should be naturally put on display at the mass consumer goods exhibition, that it was regrettable to see perilla oil alone at the exhibition, that more than five kinds of edible oil such as soybean oil, corn oil, sesame oil, perilla oil and rape oil should be displayed, and that the main kind should be soybean oil.

He was so deeply concerned about the matter of the people's edible oil that he told us again about the matter of edible oil after looking round the three storeys of the exhibition. He said that as the matter of providing edible oil was so important he had stressed the need to sell it to the people while he was giving field guidance to the Pothonggang Department Store at the end of the previous year. He continued to say that edible oil was insufficiently supplied to the people, and that it was necessary to solve the problem of edible oil at any cost and enable the stores to sell edible oil in large quantity.

A goods show does not become dignified simply because it has special commodities on display; it should have all kinds of things of the highest possible quality on display only if they are needed for the people—this was the Chairman's noble view of the people, and his spirit of devoted service for the people.

After looking round the mass consumer goods at the exhibition, Kim Jong Il said that the 2nd Pyongyang Department Store No. 1 Goods Exhibition was successful, that the 3rd round of the exhibition should be held in a larger scale and in a more sig-



Jong Myong Ok.

nificant way, and that he would visit the department store at any time. This was a meaningful promise.

After his visit we, true to his instruction, displayed 42 kinds of edible oil including peanut oil, cayenne oil, fish oil, oil of the Korean pepper bush and garlic oil. We, however, never imagined that the Chairman could no longer see the exhibition we prepared—we received the sad news—like a bolt from the blue—that he passed away in December that year. My workers, holding the commodities they were going to show him, anxiously cried again and again, "Is it true that you can't keep your promise to visit us at any time?"

Still, the warm sun was shining as brightly as ever. Our respected Supreme Leader Kim Jong Un took all possible measures for opening the next round of the exhibition at our store in a larger scale true to the last instruction of the Chairman. So, the 3rd Pyongyang Department Store No.1 Goods Exhibition was held splendidly in January 2012. As it was the first New Year we greeted after the unexpected demise of the Chairman, and the year marking the centenary of the birth of President Kim Il Sung, the visitors could hardly move away from each of the displays, their eyes filled with tears, for they knew every corner of the exhibition was associated with the benevolent care of the Chairman.

Today varieties of mass consumer goods of high quality are on the increase thanks to our respected Supreme Leader Kim Jong Un's genuine popular politics of loving and respecting the people. Keeping in their mind the Chairman's care for the people my workers are devoting their all to the service for the people, looking forward to the day of welcoming our Supreme Leader to our store.

*Jong Myong Ok, manager of the
Pyongyang Department Store No.1*

Brilliant Life



A bronze statue of the anti-Japanese war heroine Kim Jong Suk.

THE ANTI-JAPANESE WAR heroine Kim Jong Suk was an indomitable revolutionary, commander of Paektu and versatile socio-political activist who

won fame for her bravery and intelligence at every battlefield of the war. She was a perfect paradigm of the feminine qualities and character, virtue and obligation,

emotion and sentiment. The great heroine is still enshrined in the heart of the Korean people, who eulogize her exploits generation after generation. ▶

► “You’re a Heroine!”

Kim Jong Suk joined the Korean People’s Revolutionary Army (KPRA) on September 18, 1935. Receiving a rifle she expressed her determination:

“With this rifle bearing the blood of the revolutionary fore-runners and the people’s desire for national liberation, I will be faithful to General Kim Il Sung to the last moment of my life. I take this one rifle as one hundred rifles and will shoot one bullet as one hundred bullets to take revenge on the enemy. I will hold this rifle in my hand until the day our revolution emerges victorious.”

Kim Jong Suk engaged herself enthusiastically in the drills of shooting and guerrilla tactical performance, political studies and other action programmes. An energetic and persistent character, she was soon recognized for her admirable qualities for a fighter of the revolutionary army. Her special concern was directed to the shooting drill.

At the end of 1935 the Japanese imperialists, alarmed at the positive military and political activities of the KPRA at Naitoushan which is quite close to Korea, started “punitive” operations there. The enemy forces consisted of 800 Japanese and puppet Manchukuo soldiers and policemen including the most vicious “new army” and a mortar battery of the Japanese aggression forces.

At that time, the KPRA side had only the people attached to the sewing team, weapons repair shop, hospital and other service organs, Children’s Corps members and some 40 KPRA fighters at Naitoushan.

Kim Jong Suk fought in the battle, and sometimes, together

with women guerrillas and village women, carried ammunition chests, prepared and brought hot water and food to the combatants on hills from the village.

Learning that the KPRA strength was not so large, the enemy launched waves of attacks. As the enemy soldiers were all covered in pieces of white cloth except their eyes, it was almost impossible for the KPRA fighters to take aim. The situation was very unfavourable for the guerrillas as they were short of ammunitions.

Kim Jong Suk was fighting at the salient of the height that bore the brunt of the battle. After a while of a scrutiny of the enemy movement she suggested firing at the enemy when they raised their head to make a charge.

The KPRA fighters contained the enemy through a ferocious firing, and then, seated comfortably in their positions, began to shoot down the enemy whenever they raised their head. The enemy did not dare to rise up. Now afraid they would all go frozen to death if they stayed that way, an enemy officer sprang to his feet and shouted something pulling out his sword.

At that moment an old man from the village, who had been proud that he had fired nearly two sacks of ammunition in his days with the Independence Army, shot the enemy officer down with a short rifle.

Then, another enemy officer stood up in the farthest rear—it was over 400 metres away. All of a sudden a piercing gun report rang, and the officer slumped and rolled down the hill to the pleasure of all the KPRA fighters. It was Kim Jong Suk that had shot him down at a try. The old man,

who had been watching her marksmanship, admiringly said that he had never seen such a crack shot as she was. “You’re a heroine!” he exclaimed.

Despite their desperate attempts the enemy could not but retreat, leaving more than 300 corpses behind, faced with the heroic struggle of the guerrillas and other people of the KPRA side.

After the successful battle to defend Naitoushan, the KPRA unit left the place for Maanshan in February 1936. Later, thanks to the people of Naitoushan, the story that the KPRA had a great marksman spread widely from mouth to mouth.

Story about 600 Uniforms

In 1939 Kim Il Sung, Commander of the KPRA, gave Kim Jong Suk a new task of making 600 winter uniforms. He had elaborated a plan of launching large-unit circling operations in the wide areas northeast of Mt. Paektu to cope with the large-scale “punitive” drives of the enemy. Success in the operations to be staged in the severe cold depended in large measure on whether or not the task of making winter uniforms could be accomplished in time. It seemed almost impossible for the few members of the sewing team with a small number of sewing machines to make such a large number of uniforms within one month.

They worked day in and day out. When the task reached the last stage of completion, however, the eye of the needle of the sewing machine, the only needle, wore out. Some members of the sewing unit proposed finishing the making of the remaining few suits by hand.

► Kim Jong Suk, however, disagreed, saying that their handiwork, however skilful it might be, would not match the products made with the sewing machine. She continued running the machine, adjusting the needle with her hand to prevent the thread from slipping out of the eye. As the work proceeded, the other members of the team would doze off while working, overwhelmed with fatigue as they had little rest or sleep. At that time Kim Jong Suk would sing songs, giving them courage and energy.

At long last, the whole work was completed, and all the members of the team, including Kim Jong Suk, hugged one another and shed tears of joy.

When they returned to the KPRA main unit after finishing their task ten days ahead of schedule, Kim Il Sung gave a warm welcome to Kim Jong Suk and her comrades and spoke highly of their service, saying that as they had completed the manufacture of the uniforms ahead of schedule the unit was now able to launch new operations with confidence without any trouble.

In Support of the Line Advanced by Kim Il Sung

Immediately after its liberation the situation prevailing in Korea was very complicated. The US imperialists, occupying south Korea, made desperate attempts to frustrate the struggle of the Korean people to build a new country. At the same time, the class enemies, at the instigation of the US imperialists, attempted to lead the people along the reactionary road. To make matters worse, the factionalists and op-

portunists, leftist and rightist, under the cloak of being "revolutionaries," claimed that a bourgeois republic should be established or a socialist revolution should be launched at once. This plunged the people into confusion.

Kim Jong Suk told the anti-Japanese revolutionary veterans who were working in the provinces:

"We went through the sea of flames for the revolution during the anti-Japanese war under the slogan 'Let us defend the revolutionary idea of Commander Kim Il Sung even at the cost of our lives!' This slogan is the banner of struggle that we Korean revolutionaries should hold aloft for ever as we did in the past. You should carry through the line of General Kim Il Sung on founding the Party, the state and the army, frustrating the manoeuvrings of the betrayers of the revolution and factionalists, as you did while fighting in the mountains."

Wherever she went, Kim Jong Suk helped the Party organizations to carry out the line of founding the Party precisely, and encouraged young people to lead the struggle to implement the line and policies of the Workers' Party of Korea. When some young people including students were deceived by the enemy's propaganda, she saw to it that a public lecture was organized without delay for young people and students. Then, she took the floor, saying:

"If you do not want to become slaves of the imperialists again, and if you heartily wish our country to be a truly independent state, you must follow General Kim Il Sung.

"You, students, must study,

study and study for the building of a new democratic Korea.

"There is only one road you must follow: the road of democracy indicated by General Kim Il Sung."

Kim Jong Suk often met the anti-Japanese revolutionary veterans and other people who had fought for national liberation in the homeland—they would be the backbone of the government of the republic soon to be established—to discuss how to implement Kim Il Sung's policy of the building of the republic. While the national flag and emblem were to be designed, she gave detailed instructions so that the leader's far-reaching idea and policy of building a new country were properly incorporated in the designs.

On September 9, 1948 the founding of the glorious Democratic People's Republic of Korea was declared to the whole world. That evening, on returning home, Kim Il Sung called Kim Jong Suk to the dining table and offered her a glass of wine, saying, **"The three tasks of building the Party, the state and the army have been completed today. All these years you have taken so much trouble to look after me. But so far I have done nothing for you, I have only given you trouble. Today I wish to offer you a glass of wine."**

Kim Jong Suk said, "What do you mean by saying that you have done nothing for me? You gave me wonderful presents by founding the Party, the armed forces and the Republic. You have made my long-harboured wishes come true. I have nothing more to wish for."

Pak Chol Ryong

Through Technical Innovation



Mirrors are produced for major construction projects.

THE MIRROR WORKSHOP of the Pyongyang Metal Building-materials Factory produces quality mirrors of various sizes.

During my visit to the workshop its manager Hong Yong Chol told me the following story.

The workshop that produces and supplies mirrors to important projects has always overfulfilled its target of the annual national economic plan for over ten years.

This year the workshop fulfilled its annual assignment by June. This is attributable to the mass-based campaign of technical innovation. Its strategy of development consists of invention and technical innovation.

The workshop has given priority to improvement of the workers' technical knowledge and skills. It has encouraged them to acquire scientific and technical knowledge through studies related with production and sci-tech sessions.

In the course of this newcomers developed into skilled workers in a short time, and other workers took upon themselves and carried out tasks of technical

innovation. Previously the workshop was often faced with difficulties in production because parts of the machines were worn away rather earlier in their full-capacity operation. The workers thought and thought how they could prevent the parts from being easily worn away. Then they put forward a novel idea of newly designing the structures of the parts. Despite repeated failures they kept making strenuous efforts and finally succeeded in making new parts. An example came in remaking the water supply pipe of a straight polisher. High heat caused by the polishing of mirrors happened to break glasses. In order to prevent the phenomenon the workers renovated the water supply pipe of the polisher, thus prolonging the machine's life and increasing the production.

This year alone the workers made and introduced over ten plans for technical innovation including the development of the sensor system of a coating machine.

At last mirrors from the factory were registered as products

of national standard and highly evaluated at various exhibitions including national mass consumer goods exhibitions. They have been supplied to people's civilized bases of happiness such as Mirae Scientists Street, Okryu Children's Hospital, newly-built modern rural houses in once flooded North Hamgyong Province, Ryomyong Street, and other places of advanced civilization.

Recently the factory produced plastic mirrors which are very popular with the users.

The workshop manager showed me letters of gratitude from across the country. Among them was the one from a young woman silk reeler of the Pyongyang Kim Jong Suk Silk Mill. It reads, "Whenever looking in the clear mirror I feel it reflects my mind as well. I'll work hard to repay the State for having provided us with the smart hostel and good living conditions."

The workshop manager said, "We'll further employ latest sci-tech achievements so as to produce much more mirrors of various kinds."

Kim Chol Hyon

Shortcut to Leap in Productivity

THE OSOKSAN GRANITE MINE HAS become one of the famous enterprises in the Democratic People's Republic of Korea for a giant leap in productivity and a solid material foundation.

One day in April 2013 Chang Jae Ryong, general manager of the mine, was studying a design on his table. It was about a program for sensing and controlling the load current of a large-size stone cutter. Its developer was Pak Kwang Sik, operator of the cutter of the First Rough Stone Workshop. (He is currently a third-year student of the online college of Kim Chaek University of Technology.)

Presently a smile got on the corners of the mouth of the general manager. At that time the rough stone production was considerably harassed by the changing speed and direction of the saw when the cutter was under a light load with the saw deviating from the stone track. It took a lot of time to get back to normal speed and direction of the saw. If only the

program was developed successfully, it would drastically cut the time of the light load and increase the operation of the cutter so as to boost the stone production considerably. The general manager decided to offer positive support for Kwang Sik's idea and push it forward.

A technical consultation was convened immediately. Unexpectedly, however, Chang found more people stand against the proposal than those who approved it. The simple reason for the people to shake their head was that the developer was neither a technician nor a college graduate. Chang appealed, "Science and technology are in no way a physical amount that is to be denominated by external signs like the diploma of college graduation. The point is not the form but the content. The success depends on our own effort. We'd better try it with confidence."

Finally a development team was organized with Kwang Sik as head and in six months the program was completed and introduced into production, ef-





Medium-sized rough stone cutters.

Rough stone production is on the increase through timely solution of problems in operation of the self-propelled cutter.

► fecting a jump of 1.2 times in durability of the saw. This led to the opening of a sure prospect for increasing the production of rough stone 1.5 times.

Now Chang was convinced that if he found out bright talents like Kwang Sik and mobilized them he would be able to do anything difficult. Later he encouraged other workshops to learn the experience. Soon the campaign of technical innovation swept every unit of the mine.

Chang himself was granted a DPRK invention patent in February 2016, and his mine has applied more than 100 valuable inventions to production in recent years. Scores of employees have become masters of contrivances and inventors, and as many as 130 workers have finished or are attending the online college of Kim Chaek University of Technology.

The production capacity of the mine has grown to the annual total of hundreds of thousands of square metres of stone. Chang and Kim Sang Gun, a workshop manager, were awarded the title of Labour Hero and a lot of employees have received the honours of Merited Miner, Merited Driver and others, thus bringing a great glory to the mine.

Chang says, "We have obtained some good things in improving production and living standards of the workers, but this is not simply attributable to a good deal of stone deposit and favourable conditions of production. The point is that we value even a trifle of talent and direct primary attention to sci-tech development."

The policy of attaching importance to science and technology and talent is the cornerstone of the mine's prospect.

Kim Son Myong



Joy of Tractor Producers

THE KUMSONG TRACTOR FACTORY produces and supplies 80hp *Chollima-804* tractors of new type to rural communities. Seeing those tractors leaving for their destinations Hwang Man Il, chief engineer of the factory, told the following story.

Last year the workers of the factory developed the new type of tractor and were making prepara-

tions to produce the tractors in a serial way. However, the designing of jigs and equipment appropriate for the serial production was not smooth. One day Ro Pu Song, an old man who had taken part in producing the first *Chollima* tractors, came and told the technical officials and workers about what had happened at that time. ▶



In October 1958, when the Chollima movement was under way in Korea, the factory was faced with the task of producing tractors by itself. At the time, workers and technicians of the factory had no relevant experience and technology, and they did not have even a single design. But they displayed the spirit of self-reliance and performed a miracle of making one of the first tractors—21kW wheel tractors—in 35 days.

Ro said that they had learned the truth that they could do what they were determined to do by relying on their strength, and that nothing would be impossible if the truth was kept in mind in this era of Mallima.

The old man's story kindled a flame in the heart of the workers of the factory.

Now the workers and technicians turned out as one, leading and helping one another. First of all, they put main efforts in strengthening the existing production foundation and designing and making the jigs and equipment while giving priority to the supply of parts. With their own effort and technology the moulding workshop, steel casting workshop and others, which are in charge of the first process of production, newly made different kinds of metal-mould equipment for parts such as the gearbox, the front frame of tractor body, the clutch and the main body of the front wheel drive.

They also put efforts in arranging the process for producing the gear workpieces by using spheroidized graphite cast iron. Previously they would make the workpiece of alloy steel, and there were difficulties in providing the raw material and producing the gear. So, they thought of using the graphite cast iron as a substitute for alloy steel and conducted relevant research. Though there were many problems, the technicians and workers made concerted efforts to solve them. Thus they arranged the production process and tried to process first workpiece but the result was not good—the problem was the mixing ratio of raw materials.

At this juncture the researchers of the ferrous metal research institute of the Chollima Steel Complex and Kim Chaek University of Technology came to help them. They found out the proper mixing ratio and conducted a test but in vain. The second test was also not successful but the workers of the factory and the researchers were not disappointed. *We may fail ten times but each time we'll try again to make the gear of our style*—this was their aim and will. Their painstaking efforts resulted in the successful production of the gear, and they in-



stalled it on the tractor. Several rounds of test on the strength of the gear proved it high-performance, which meant success. This made it possible to make the tractor's gears of the graphite cast iron instead of alloy steel.

In August last the factory completely finished the assembly of over 100 tractors of the new type and started their partial and overall test run.

Now the workers of the factory recall with delight what they did by dint of their own strength, and are continuing to make innovations to produce more tractors which are badly needed in rural communities.

Rim Hye Gyong



Bumper Apple Harvest in Kwail County

SOUTH HWANGHAE PROVINCE'S KWAIL County, a leading fruit producer in Korea, reaped an unprecedented fruit harvest this year.

To raise the fruit output, the officials and workers of the county newly opened hundreds of hectares of orchard, produced *hukposan* and other organic fertilizers and created a 15-km windbreak along the coastline. Demonstrating the spirit of self-reliance they built an agrochemical production process in the cold midwinter and studied and produced different

kinds of agrochemicals with their own efforts while working to keep the fruit trees from the damage of blights.

Together with this they, with a high aim of putting production on a scientific, modern and intensive basis, widely applied results of scientific researches to the fruit farms. They cultivated fruit trees of good species, carried on seed improvement and set up an integrated management system to enable each workteam to do scientific fruit-growing in keeping ▶



► with the weather and climate conditions. In particular, they increased the per-hectare yield 2.5 times as against last year, especially 5.8 times for apple, even in the face of persisting drought and high temperatures. It was a miraculous achievement.

In September last Supreme Leader Kim Jong Un visited the county. Touching apples hanging heavily from branches, he said the harvest reminded him just of the words "so many fruits as to make the earth collapse." It was tremendous that many of the workteams had reportedly registered the per-hectare yield of 70 to 80 tons, he said, and added with a laughter that it was amazing that each tree bore more than 200 apples on average, and over 300 at the maximum. Then the Supreme Leader said that he was relieved of the burden of all fatigues to think that the people would be glad to hear the rich harvest of fruits. He earnestly asked to convey his thanks to the officials and workers of the county for their extraordinary bumper harvest.

Now the entire county is engaged in the effort to make good preparations for another rich harvest next year.

Sim Hyon Jin



Window Farming

RECENTLY WINDOW farms have appeared across the capital city of Pyongyang including Ryomyong Street, adding to the emotions of life. We visited the Pyongyang Vegetable Science Institute to know details about window farming. We met Ma Il Hyon, a hydroponic researcher of the institute, in a hall housing varieties of well-designed and profitable window farming devices. The researcher said, "Window farming is based on hydroponics. Necessary devices are placed at sunshiny windows to raise fruit vegetables, edible and medicinal garden plants and aromatic plants by means of natural light, temperature and nutrient solution." Window farm is also called home garden. Among vegetable farms depending on hydroponics, the window farm costs the least, covers small spaces and is

easy to manage. And it helps urban people to raise and use fresh vegetables all the year round.

The scientist went on to explain about the merits of the farm.

The farm can produce 80 to 100 kgs of pollution-free vegetables a year in any sunshiny places such as rooms and offices without using soil. And the farm ensures fresh air and green environment indoors so that people can feel the taste and fragrance of nature. It is highly commented upon by office workers and elderly people as it is effective in natural and psychological treatments. Children can cultivate rich emotions while seeing the growth of plants.

He led us to a hydroponic laboratory saying that a window farm can produce as much fresh air as that from an anion generator. The laboratory was a place

where problems arising in realizing window farming were solved. The laboratory established the relevant cultivation system while producing substrates, devices and nutrient solution for cultivation.

We met Kim Sun Bok, a member of the laboratory, who made the nutrient solution as required by each crop, and she said, "Nutrient solution is very important in window farming because it depends on the solution. Every crop needs different nutrients in different periods so I made different kinds of solution to suit different crops."

Ma Il Hyon said that they chose materials of cultivation substrate light and easy to use in accordance with the features of home gardening. And we met the head of the laboratory. He said that window farming makes plants grow fast with the help of the solution and that it is profitable and ornamental as it hastens the growth of fresh vegetables 50 percent faster than soil cultivation, free from harmful insects, and provides green environment. He went on to say that previously hydroponic greenhouses were built across the country, that they gained a lot of experience during the period and that it was easy to manage window farms. And they would intensify the research on problems arising in introducing and managing such farms, he added.

We could see fresh tomatoes, strawberries and cucumbers cultivated in the laboratory as well. Such farms will make the people better-off.

Kim Chol Hyon

1. Pipes are used for vegetable cultivation.
2. Fruit vegetables are raised on racks.
3. Vegetables are grown in pots.



Nano-selenium & Oligosaccharide Capsule



THE NANOTECHNOLOGY Institute of the Cutting-edge Science Centre of Kim Il Sung University is well-known in the scientific research world for development and introduction of different kinds of things of latest models. Recently Kim Sung Chol, the director, Kim Yong Nam, a section chief and Min Hung Suk, a researcher, using a new version of nanotechnology, produced the nano-selenium & oligosaccharide capsule, which is effective in treating arthritis and other kinds of diseases, by making an organic compound of nanotechnology-treated selenium and oligosaccharide extracted from the crab crust.

Through repeated experiments and research they cut the toxicity of selenium dozens of times lower than the existing organic and inorganic selenium products, thus enhancing the safety of the medicine considerably.

Having observed the clinical trials of the medicine for years, relevant medical experts and nutritional researchers and other nanotechnologists unanimously approved that the new medicine is a new kind of nanotechnological product that is based on a rational compound of different sorts of pharmacological functions of nano-selenium and chitosan-oligosaccharide. The medicine has been found to have the best pharmacological effect in removing the inflammation and pain in the joint areas and rehabilitating and

protecting the joint cartilage.

In the past the developers paid deep attention to the fact that selenium is an essential microelement for man's normal living and that some 70 percent of the world's land area including Korea was declared as deficient in selenium. The daily food taken by man contains only one tenth of the necessary amount of selenium, and the aging process gets accelerated as the antioxidant-producing ability of the body falls with their getting on in years.

Now the researchers decided that the settlement of the problem is an essential and critical issue in the human living activities, and began to tackle it. But it was by no means an easy task. A lot of problems arose in the effort, such as ensuring the proper size and stability of nano-selenium and making a high density of chitosan-oligosaccharide. The researchers were dauntless, though. Through dozens of tests and experiments they found out that selenium, when entering the body, works as antioxidant and immediately removes harmful elements. Moreover, they learned that it prevents the cells from being damaged and helps people live longer.

On the basis of the knowledge they successfully developed the nano-selenium & oligosaccharide capsule by compounding selenium with hydrolysed chitosan-oligosaccharide, which is another element of the capsule.

As the medicine has all the favourable pharmacological functions of nano-selenium and chitosan-oligosaccharide, it is very helpful in treating and preventing arthritis and other kinds of diseases. Especially, it clearly inhibits the formation of the blood vessels of the cancerous cells and the transfer and growth of the cancerous cells, and improves the immunity of cells so as to prevent or treat different kinds of cancer like those of lung, liver, breast and pancreas. For the merit the medicine is gaining great popularity.

In addition, the capsule is good for prevention and treatment of cataract and inflamed prostate gland, and for improvement of the cerebral function and the men's sexual desire.

The productivity is also high as there is an unlimited amount of materials for chitosan-oligosaccharide and the production of nano-selenium costs very low.

The product was registered as latest sci-tech product for its approved originality and rationality of the nanotechnology used for the development and manufacture. It took first place at the 32nd national sci-tech festival this year.

The researchers are redoubling their effort to attain a greater target of developing still more kinds of things based on latest science and technology.

Sim Hyon Jin

Woman Doctor

IN FEBRUARY THIS YEAR THE WORLD Intellectual Property Organization (WIPO) conferred a certificate of the world intellectual property right and a medal of inventor on Yu Son Ok who had developed a natural biological activator based on materials in the Democratic People's Republic of Korea. She is the head of a Koryo biological medicine laboratory of the botanical research institute under the State Academy of Sciences. The biological activator is fifth-generation organic fertilizer which is so widely used as to be well known to everybody engaged in agriculture.

Yu was originally an expert on animal husbandry and veterinary work. She changed her career for the following reason.

In the 1980s the DPRK underwent a huge loss in agricultural production owing to the multiplication of rice water weevils. She was grieved at the reality.

At the time Yu was a teacher of the faculty of animal husbandry and veterinary science of the then Sukchon College of Agriculture. She had not enough time to do educational work and the research at the same time. So she would sleep only for two hours a day. Her goal was to develop a vegetable insecticide. She analysed the properties of plants growing in mountains and fields of the country and found out over 200 kinds of vegetable sources capable of killing the abovementioned insects. At last she developed the agricultural medicine—titled *Myongrok*—whose basic elements are vegetable. It killed the weevils that had been killed only by chemicals and over 80 other sorts of harmful insects. Then there

was formed a Koryo biological medicine research group with her as its pillar. Thus, she could accelerate the research.

One day a new idea hit Yu as she considered that plants had maintained their species with their own function of protection. What attracted her attention was that some plants emit essential oil disliked by insects or poison fatal to insects or defend their habitat by suppressing others' growth. She combined such plants' ingredients to develop another vegetable insecticide *Myongrok-3* free from the disadvantage of *Myongrok* that had been used only as insecticide. *Myongrok-3* was a composite vegetable insecticide which made it possible to sterilize seeds without using such chemicals as copper sulphate, formalin and iron sulphate, prevent damage from harmful insects, accelerate growth and increase the rate of rooting of trees.

Yu was not content with that. Now she decided to develop natural fertilizer to substitute chemical fertilizer. To develop the natural fertilizer, she examined physiological activity of over 300 kinds of plants and found out the elements necessary for growth of crops. Thus she succeeded in developing the natural biological activator.

The multifunctional fertilizer is really like a tonic for plants. And it advances the time for an increase in chlorophyll content from three hours to two hours compared with organic fertilizer made in the countries leading the world in organic agriculture, and increases grain output while decreasing the utility of chemical fertilizer 50 percent.

Yu received three state patents, got five national standards, wrote eight scientific books and published over 30 valuable essays. Her research achievements always won high ratings at national science and technology festivals, exhibitions and shows. Thus she became a Doctor and a Merited Scientist, and was awarded the February 16 Scientific and Technological Prize, the highest honour for scientists in the country.

She had two sons, and the sons and their wives are also scientists. The elder son together with his mother, received a certificate of the aforesaid kind. This means that the tradition of the scientists' family is being carried forward. Having devoted herself to scientific research out of patriotism for nearly 40 years, Yu is still working as a scientist.

Rim Ok

Yu Son Ok (middle).



Breaking New Ground in Cancer Treatment

THE RADIOLOGY RESEARCH Institute of the Academy of Medical Science has developed the antineoplastic ionic gold injection, a natural medicine. This injection is favourably commented upon by experts and users as it is a new anticancer drug different from the previous similar drugs in physiochemical and pharmacological activities.

Solving Knotty Problem

It is 16 years ago that Pak Chang Hyon, a researcher of the institute, started the research to develop the aforementioned medicine. At that time nanotechnology developed to make it possible to make nano-gold particles capable of preventing tumour metastasis, and anticancer medicines using gold were applied clinically. Those medicines, however, produced many problems because of their toxicity and harmful side effects. Cisplatin, one of the most efficacious similar medicines widely used in the world, also had critical side effects causing nausea and vomiting. To relieve patients of pains it was imperative to remove such side effects while maximizing the anticancer effect of gold.

Pak was determined to solve the problem. Without relying on the established method of making gold injection, he pioneered his own road of invention. Through serious research he invented a new technique of melting, extracting and separating high-purity gold. Then he dispersed and ionized the gold in a solvent with high biological activity so that it would help remove side effects of the relevant medicines. This led to the making of the anticancer medicine that costs one tenth as much as other similar ones and can be used safely for

cancer prevention and treatment and for promotion of health.

The injection received a national standard in 2014 and the patent right of the Democratic People's Republic of Korea in 2016. This year alone the injection won gold prize and first prize at the 15th national invention and new technology exhibition and other similar events.

Hopeful

Three years ago Yang Hye Yong, a woman resident in a suburb of Pyongyang, was taken to the aforesaid institute for terminal carcinoma of ovaries combined with cancerous abdominal dropsy. The institute administered the existing anticancer medicines to the patient according to the standard treatment method but in vain. Rather, she developed symptoms of vomiting and alopecia totalis. At this juncture, Ri Song Jun, head of the institute, ordered the antineoplastic ionic gold injection to be administered to the patient. When 50th ampoule of the medicine had been injected into her, her condition started to be improved with the abdominal dropsy sunk. The decreased leukocyte count increased, the function of immunity was enhanced and the metastasis of cancer was contained. For three years she has used the injection, living without any trouble.

The institute injected the medicine alone into a hundred and scores of cancer cases who had relapsed into the cancers or had had metastasized cancers after receiving post-operation chemotherapy and radiotherapy to confirm that the clinical efficacy of the medicine was 70-90%. And the administration of ionic gold injection together with radiotherapy to those patients who



Pak Chang Hyon is engrossed in research.

could not receive any treatment for their lower leukocyte count (below 3 000) resulted in their increased leukocyte counts and improved common conditions, putting an end to interruption of the treatment.

Combination of the injection and the existing anticancer drugs further enhanced the efficacy of the treatment without resulting in toxicity and side effects. The institute and the Breast Tumour Institute of the Pyongyang Maternity Hospital clarified that the ionic gold injection attacks and destroys cancer cells as targets and reduces the activity of the MMP enzyme that causes cancer metastasis, thus containing metastasis and serving as an antioxidant. And nearly ten years of clinical examination showed that it is specially efficacious for breast cancer and mastopathy, and effective in prevention and treatment of post-operation metastasis and relapse of cancer. The patients who have used the injection say that they are hopeful of being saved while using it.

Now Pak Chang Hyon, on the basis of his experience in the development of the antineoplastic ionic gold injection, is redoubling his effort to develop another highly efficacious medicine with no side effects.

Rim Ok

Teachers in Van



Lessons are given using the education-support program “A Land of Mystery” (fauna).

TODAY KOREA IS RAPIDLY improving pre-school education along with enforcement of universal 12-year compulsory education. Kyongsang Kindergarten has set an example, its educational conditions attracting public attention. In the past it was well known across the country for creating a lot of good models of kindergarten education: for example, stars pasted on walls of corridors, footprints carved on stairs to show the rule of walking on the right side facing traffic and big red star-shaped ceiling to the liking of children—all of them demonstrate its teachers' efforts made to develop the intelligence of children and cultivate their emotions and feelings and morals. So all visitors to the kindergarten said in admiration that they felt as if they had been in

the world of a fairy tale or a land of mystery.

The kindergarten is now creating more new educational conditions one after another. One of the conditions is based on “A Land of Mystery” (fauna), a children's education-support program, which makes an animal in a picture real-like. The program is based on augmented reality technology, one of the cutting-edge technologies. For example, in a picture of a tiger projected by a camera of a tablet a tiger looks alive and moving. The tiger can be rotated in all directions, and one touch on the screen can make it howl or make distinctive motions. Children in kindergarten days are curious, and especially they are very interested in the animal world. So teachers of the kindergarten thought of making

that program for accelerating their intellectual development. The program makes it possible to show children a vivid scene of a dolphin leaping into the air from the surface of the sea, a wild goose flying in the sky or a bear wandering in a forest. And with shadows of the children projected on the screen it also can make them feel as if they were in the presence of such animals. That is, the children can experience a land of mystery where they meet animals that move as they wish while sitting in a classroom.

This helps enhance children's concentration and observation and develop their intelligence. The introduction of the program led to improvement of the children's ability of weighing a thing with another and creating a thing in their own ways. They became ▶

- able to easily grasp words that are intended for primary schoolchildren and use the words to make sentences whose meanings were obvious, and one of them thought of making a multifunctional motorcar capable of flying in the sky, sailing in the sea and going underground by combining special skills of wild goose, dolphin and mole.

The kindergarten created new educational methods to suit the psychology of children who prefer frolicking to sitting still and hardly forget what they learn in play. For example, there

is a lesson which enables children to spontaneously understand counting, greetings in different situations and so on during rope jumping and other kinds of play.

The educational methods also help bring up young, able musicians. In the past the kindergarten's musical performance only included a solo, trio or quartet. But now its children can understand not only melodies of individual musical instruments but also those of all the instruments and play their individual instruments to suit the combined melodies of the instruments thanks to the development of their intelligence. Thus, they can play orchestral music which is difficult for

even adults to play well. Once an elderly man, who came up to Pyongyang to see his grandson, visited the kindergarten. After looking round it, he said with a smile that they should not use the word *kindergartener* at random. Foreign visitors said in admiration that the kindergarten's educational level was really high and that they were impressed by the fine children.

A lot of its counterparts of other countries are to invite them to tell them about its educational experience, Ri Kang Juk, headmaster of the kindergarten, said and added, "What we've done is what we should do rather than a success when our country is leaping forward toward a land of education and a power of talented people. We only wished to live as pioneers to open up a new path as teachers in the van of education."

Ri Kum Chol

The intellectual quality develops through the rope jumping and artistic performance.





Following the Spirit of Heroes

THREE IS HANDU-DONG IN HANGGU District some distance southeast of central Nampho. Some time ago we visited the Hero Handu Junior Middle School situated in the dong. Passing the gate of the school surrounded by tall poplars, we entered the playground, when there rang a bell telling the time for the beginning of afternoon extracurricular review lessons. Choe Myong Hwa, headmaster of the school, was the first to greet us. An ordinary woman of medium height in her mid-forties, she was neat in appearance. According to her, the school was titled Hero Handu Junior Middle School 15 years ago for it had produced a lot of heroes.

She guided us through the entrance of the school building, where we stopped at a noticeboard on a wall of the left corridor. It displayed photos of five Heroes of the Republic and nine Labour Heroes, all graduates from the school, and data on their life and struggle. They included Kim Sung Un, a Hero of the Republic, who had shot down five enemy planes with small arms during the Fatherland Liberation War (1950–1953) and Han Kum Hui, who was awarded the title of Labour Hero in 1996 as she distinguished herself in assisting the People's Army. What especially attracted our attention was the question *Who*

will become the next hero? written boldly in the 15th blank of the board.

Saying that the school often held meetings with heroes, pledge meetings and seminars in front of the board so as to implant the spirit of the heroes in pupils' minds, the headmaster led us to the room of 3-4 class, where there was an oratorical meeting of the classmates. Ro Jin U was reciting a poem of Hero Ri Su Bok who had blocked the embrasure of an enemy pillbox with his breast in a battle on Height 1211 during the Fatherland Liberation War.

...

*Is there any life, hope or happiness
Nobler, greater or more beautiful
Than giving up my youth for my country.*

Then Ri Yong Chol, standing at the lectern, said enthusiastically, "The next hero must be among us. I'll surely be the 15th hero to bring glory to our school." The images of the pupils full of enthusiasm reminded us of the heroes. Ri Jong Sil, a literature teacher, said that pupils could develop their ability of expression through such frequent meetings in after-school hours, and that the meetings were greatly helpful in education of pupils.

Now, back out, we headed for a new school build-

► ing that the school had built last year by their own efforts. It had multifunctional classrooms designed in a modern style to suit ages, mentality and characteristics of the pupils, a room for practice in cooking, a language laboratory, a room for the study of natural science and a room for a dancing circle, all equipped in such a way as to enable pupils to fully develop their talents according to their ability and aptitude. We could see pupils preparing themselves to develop into future masters, pillars and heroes of the country.

Out of the new building, we saw pupils doing something around the school fence and went there. Together with members of 2-5 class, teacher Kim Myong Hui was propping up young trees with wooden supports. She was well known to the district and the city for having brought up a lot of good pupils including Han Kum Hui, the first woman Labour Hero of the school. She said with a smile, "There grow lots of trees of select species including pine trees and pine-nut trees around the school and in the school grove. Most of them were planted by those who graduated from the school. Among them is a pine tree planted by Hero Han Kum Hui. I and all other teachers help the pupils follow the examples of the heroes by planting trees and doing good things. And now we make it a rule to do so."

Saying that the school was making the work of education and edification aimed at inspiring pupils to follow the spirit of the heroes, the headmaster told us about the achievements of some pupils including Jang Kuk Jin who invented and displayed a nano medical examination and treatment device at a national children's science fiction and model exhibi-

Schoolchildren grow to be pillars of the country.

tion held in 2017 and Ri Ji A who, as a participant in the 8th Congress of the Korean Children's Union, had a photograph taken with Supreme Leader Kim Jong Un.

Promising the headmaster we would revisit the school when it produced the 15th hero, we left the school.

Kim So Yong



Nine Consecutive Victories

A FEMALE HANDBALL team of the Moranbong District Juvenile Sports School is recognized as the best among those of the same schools.

In August last, too, the team won the relevant event of the 54th national juvenile sports schools' games by beating all the rivals. There was a great response among the spectators to the final match between the team—named Moranbong Team—and the Pongsan Team from the Pongsan County Juvenile Sports School. Seeing the Moranbong Team members' instant throws and one-to-one fakings, and left and right wingers' skilful handling of the ball, the spectators admired the instructor who trained them into fine players. At last the team defeated its rival by a lopsided score.

The winner's success is attributable to strenuous efforts of its instructor Kim Kyong Suk.

It was in 2008 when her school's senior team she was in charge of took part in a competition. It was the team's debut, and they took second place to their

regret because they lacked the sense and spirit of competition. This made her full of remorse, and she determined not to lose again.

She made scrupulous efforts to improve the skills of her charges in close connection with the administrators and handball researcher of the school. First of all, she put emphasis on the work to unite the players with one mind. One day Ri Myong Jong, a left winger, was absent from training. After work she visited the girl at home to see her seriously ill because of overfatigue from training. It burnt her heart to see the girl in that condition. Then she said, "Let's bear it, Myong Jong. If you yield to the hardships, you won't be able to realize your determination to become a cornerstone to support the country. My only hope is to see you develop into a star to add glory to the country."

The next day the girl began to take part in the training again, and her friends helped her carry out her training schedule without fail.

The instructor carefully drew up the plan of training to suit the

charges' high enthusiasm. She intensified their basic training, especially that in throwing, catching, faking, throw-in and dribbling, and strove to employ methods based on the data about the latest sport science and technology in their practical training.

Meanwhile, she often organized matches with able teams, and on the basis of analysis of the results, she invented and further polished new training means and methods.

Her efforts bore fruit. Her charges won the relevant event of the national juvenile sports schools' games in 2009. From then on the team won the event of the annual games. This year it got it for the ninth time.

According to the administrators of the school, those from the school's handball circle are active as seeds of different sports clubs.

The administrators and the instructor are striving to invent new training methods with unusual pride in being responsible for raising reserve players for the country.

Sim Hyon Jin

At a tactics discussion.



Full of joy over a win.



Spring

By Ri Myong



(Continued from the last issue)

4

K WON YONG SOK HAD not yet recovered, even though two days passed. However, Ra Hyon strongly advised the old carter, who was there to attend Kwon, to move to another place.

That night Kwon was moved to a pit of a fish soup restaurant. The much-frequented restaurant might be safe, for it was outside the walled city and drew little attention of police. At the dawn of the fourth day after he lost consciousness, Kwon opened his eyes but was in and out of consciousness. Only toward evening he came to as his serious wound healed a little with his fever falling down. Ra Hyon, who had exerted herself to restore him to consciousness, was so glad, but his face was expressionless. Only his pale eyes recognizing her sparkled for a moment, his wilted lips quivering. Did the coma in which he was wandering the chasm of death divest him of his feeling and memory? Or did his mountain life to resist the society make his humanity as withered as a dead tree? Their first meeting

was so dull. She was sorry about it. She had once likened the heartless man to a warrior of a legend in the puberty period, and now she would occasionally visualize him as a reliable and brave hero. Meanwhile, she could understand him. He might have a grudge against her because she had made him go through all manner of bitter experiences five years before. Anyhow, without showing her awkward feeling from failing to share both the joy of meeting and the inmost thoughts with him, she came and sincerely treated him every night.

It was five days after Kwon recovered consciousness. "Ms. Ok, don't come here anymore," Kwon said bluntly and heartlessly, for the first time, hurting her heart. His words were still reverberating in her ears. Her heart further ached at the heartlessness which she thought made little of her efforts accompanied by dangers. His bullet wound had become much better but his condition was still serious. Pus was still oozing out of a wick sponge in the wound. The wick had to be frequently replaced with new ones and medicine should be injected into the wound. The treatment was impossible without the help of a

medical specialist. Kwon, however, positively refused to be treated by her. This disappointed her. It might make her carefree to give up, and he was the "special criminal" Sang Gi and his men tried to catch by using a dragnet.

Ra Hyon stood up with her first-aid bag in her hand. Lying in bed, Kwon said in a low voice, "Could you do me a favour?" She kept silence without answering. "I need more external medicines." "Don't you trust my treatment?" "No, you're wrong." *Then there may be another wounded person*, she thought. Now she seemed to understand why the medicines she had left for his treatment were gone so quickly for some days. The police authorities had ordered pharmacies and doctors in the city not to sell external medicines and were investigating the state strictly. Sometimes some plainclothes policemen showed up at the Jahye Hospital to inquire into the consumption of such medicines but not so discourteously perhaps because they knew the relation between Sang Gi and Ra Hyon. *But if the medicine is for another "bandit"...* "It seems difficult," Ra Hyon said. "Um," he moaned without saying anymore. There was an awkward

► silence for a while. He grimaced with a chilly look. She trembled to think that he seemed to read her inmost thoughts. *He perhaps didn't believe me from the beginning, so he refused to get treatment so as to dissuade me from coming anymore*, she thought.

"Ok, then..." He blurted, this time with a look full of trust. "Now we have another person who had his arm wounded. He is a Korean. He had a narrow escape from a secret construction site, but his place in the walled city is endangered. We should have a pass ticket to get him out of the city as soon as possible. Can you help me?" "A pass ticket?" "I heard that Sang Gi had turned into a police detective of the Japs. Can't you make use of your acquaintance with him? I know there was an intimate friendship between you in the school days." Ra Hyon blushed. It hurt her feeling that Kwon drew a conclusion about her relation with Sang Gi in his own way. She could not resist a bitter smile. "Mr. Kwon, you have no idea about the outside. Their eyes have become bloodshot at your sudden attack. Any relation or acquaintance won't work." "In fact, the Japs tried to kill all workers in the secret construction site," Kwon said, closing his eyes gently. It was not because of the pain in the wound. He seemed to be in deep thought. After a while he opened his eyes that were burning like charcoal. And the corner of his firmly closed mouth revealed that he was making a grim resolve. "Sorry, I have asked you for something beyond your capacity," he said, withdrawing his request readily. Stirred by the sixth sense, she falteringly expressed her inward thoughts. "I wonder... if you intend to meet Sang Gi." "Haha!

Is that impossible? You know we are not strange to each other," he said with a toothy smile. Rather startled by his self-possession and self-confidence, she wanted to tell him about the situation as it was. "It's still difficult for you to walk, and you don't know all about him." "Yes, I know him. And we were once classmates. I want to believe that he has national conscience even though he belongs to the agency of the Japs. In the school days he was touched by the sufferings of our nation more seriously than anybody else. He wept sorrowfully yearning for the deprived spring. And he was very indignant that I refused to plant a tree in the school forest. I can't believe that he's forgotten all the beautiful memories."

His wan eye rims rose revealing a tender light. It seemed that he recollected the school days joyfully. Ra Hyon was distressed by his simplicity whereby he saw the actual reality with everything changed the way he did in the past. Bending and spreading his injured knee, he went on to say, "I have to save the man who had escaped from the secret construction site. That night he couldn't go with others as he got injured in his arm. The Japs had planned to kill secretly all the labourers, whom they forced into the secret construction of an arsenal to be used for invasion of the continent, just after the end of the project. They thought that only the dead could keep a secret. Born in Jolla Province, he was taken to the fatal position after he came here cheated by an offer of job, and he might have become a forlorn wandering spirit there. His beloved family at home must be earnestly waiting for him...."

His voice was low, but each of the words was full of righteous

indignation, affection and warm humanity. Ra Hyon now came to know about the special incident Sang Gi had mentioned and why a garrison was crushed. If those who risked their own lives like Kwon to rescue the innocent workers forced into work on the secret construction site are bandits, she thought, they are really true men.

Then what kind of man is Kwon? I can't understand him at all yet but he might be a person I missed in a beautiful dream. The incident of the private school's reading circle, too, shows he is an enthusiastic person who has an unusual intention and love for the nation in his heart. She was excited to think that she had not been wrong in her expectation and hope. *If he cherished such an extraordinary intention he might go and meet Sang Gi in person. Sang Gi, too, might nod his assent to that ardent love for the nation, she thought.* What worried her was if Kwon was able to go out with that wounded leg.

The next morning, Sang Gi dropped in on her at the hospital. He had been usually calm and polite. But now he was somehow restless with a red face. He said, "It's a small world indeed. Do you know who is the criminal we are searching? You will be frightened. He is the beetle brow who might have died in prison due to the incident of the reading circle in the private school days. He once branded you a book thief."

His words frightened her. *How did he know it?* She wondered. *Did Kwon already have a talk with him?* Licking her drying lips, she looked timidly at his face with the dark eyebrows wriggling underneath his soft hat.

(To be continued)

Our Woman Driver



Jang Yong Hui.

A LOT OF WOMEN IN KOREA ARE LEADING a worthwhile life as eminent scientists and heroes held in affection by the people. Among them is Jang Yong Hui, a driver of the Songsan Tram Company.

Choice

People often say that youth is the period full of countless dreams. The same was the case with Jang. In her worthwhile school days she wished to become a woman as excellent as the world table-tennis queen or experienced women doctors. Once she moved classmates to laughter by saying that she would become a tank driver. Only her father, a war veteran, agreed with her idea. At that time he told her about a story of what a maiden driver hero had done during the Fatherland Liberation War (1950-1953). The hero driver was Kim Hak Sil.

One day in October 1951 a supply convoy to which the hero belonged encountered heavy bombings by the enemy planes during shell transport. A truck in the van was wrapped in flames. At the critical moment she instantly got on the driver's cab of the truck and drove it to a safe place. Her self-sacrificing effort saved over 80 trucks loaded with a lot of shells.

At the end of the story, Jang's father said, "There were many women among the brave defenders of the country. They were small and weak, but they devoted all their youth and lives to the country. You are also a woman. What is important is for you to live always comparing yours with their mentality."

The father's words made the daughter determined to become a hero driver like Kim Hak Sil to dedicate herself to the motherland which the fore-

runners had defended at the cost of their blood. In 1998 she became a driver of the abovementioned company after graduating from middle school.

Mother's Wish

The day when Jang began to work as a tram driver in clean uniform was the happiest and most unforgettable day in her life. People presented bouquets to her and garlanded her praising her as a maiden driver.

Her career, however, was not smooth. She had to expose herself to morning dew earlier than others to carry the passengers on their way to work. She often had to work all night to prepare and repair parts of the tram for its running the next day. Whenever she was tired, she thought of giving up. Moreover, it irritated her that she failed to do her duty well as a housewife and mother. Every Sunday and other holiday she had to work instead of spending her time with her lovely daughter. She often wiped tears she shed sorry about her failing to take proper care of her single daughter. One day she came back home at 11:00 pm after finishing preparation of her tram. She entered the house to be startled at the sight of her daughter Kyong Hui sleeping embracing her mother's pillow tightly. *How much she must have missed me, and how much she must have wanted me to hold her in my arms,* she thought in tears. But whenever her heart was fretted by care and anxiety, she thought of her father's words, and braced herself up comparing herself with the hero Kim Hak Sil. In the course of this she developed the spirit of thinking of the country and the people before herself and came to understand what a worthwhile life is.

It has been 19 years since she started her career as a tram driver. During the period she drove the tram with passengers on over a distance of hundreds of thousands of kilometres. This can be done by any citizen of the country, but the State made her known as a labour innovator and meritorious person of the Songun era across the country, and encouraged her to continue with her career as a woman tram driver in the memory of the country and the people.

The day she was congratulated by the people, she, holding her daughter firmly in her arms, said, "Listen, Kyong Hui. Only enjoying happiness is contrary to morality. In future you must repay the benefit of the country that takes care of and holds dear even ordinary workers like me. It's my greatest wish."

People still hold Jang in respect and affection, calling her *our woman driver.*

Kim Son Myong

Holiday Camps and Sanatoria in Good Operation

NOW THE DEMOCRATIC People's Republic of Korea is invariably enforcing social policies for happiness of its citizens despite the US's severe sanctions and blockades against the country. A *Korea Today* reporter Kim Hyok Myong had a talk with Pak Chol Ung, a bureau director of the Ministry of Labour on the matter. Excerpts:

Now the US, Western countries and south Korean puppets are resorting to various anti-DPRK smear campaign to distort the reality of the country as if human rights were not ensured there.

You're right. Now the US has the impudence to rattle on about a situation of human rights in our country. America has only inflicted tremendous losses of manpower and material upon us politically, militarily and economically century after century. Recently they have severely ham-

pered our efforts to develop the economy and improve the people's living standards through unprecedented sanctions to embargo our regular trade activities and economic exchanges. And yet Washington is speaking ill of our living standards and human rights situation like a thief casting the blame on an innocent person. It's true that we are undergoing difficulties in terms of economic condition and living standards due to sanctions and blockades by the US. But our people receive lots of social benefits from the State under the Workers' Party of Korea's politics of attaching importance to, respecting and loving the people—the Party regards policies for the people as the most important of national affairs.

I want to know about it in detail.

I have a lot to say in many aspects, but I'm going to say only about social benefits the people

receive through holiday camps and sanatoria. Our country has hundreds of holiday camps and sanatoria, where hundreds of thousands of people enjoy themselves every year. In December last year holiday camps for farm workers across the country went into operation, and this year all other holiday camps were crowded to capacity in summer and autumn which are called recreation days. Of course the State takes thorough measures to support the holidaymakers, and most of the relevant expense is borne by the State. The holiday camps run greenhouses, mushroom farms and livestock and fish farms they built by themselves, and their fresh products are used for holidaymakers' meals free of charge. The camps draw up diversified recreation schedules in accordance with their own geographical characteristics—the schedules include sea bathing, climbing, field trip and amusements—so as ▶

The Thaecheon Agricultural Workers' Holiday Camp.



► to make holidaymakers have happy days. The Myohyangsan Holiday Camp and that for farm workers newly built in Tongnim County, North Phyongan Province serve as standards for other similar camps across the country.

And factories and enterprises also run sanatoriums. Many of the sanatoriums including that of the Kim Chaek Iron and Steel Complex are popular with the workers as they serve them scrupulously.

At present we are pushing ahead with the work to renovate the existing holiday camps and sanatoriums and build new ones as required by the trends in the development of modern architecture and the modern sense of beauty, according to a phased plan.

Recently, I was told, homes for war veterans have

been built and put into operation.

Our country had already seen to it that every province established and ran a modern home for war veterans who fought bravely against the US imperialists during the Fatherland Liberation War (1950–1953), and Supreme Leader Kim Jong Un had established more similar homes in all provinces and he himself examined the design of that for war veterans in Pyongyang. Thus the home was built in a modern style in the picturesque area of Mt. Ryongak in the city and went into operation, and all other similar homes built in each province are in full operation. The homes are for not only war veterans but also wartime meritorious persons and postwar meritorious combatants. The homes are fully provided with conditions for the veterans

to rest and get medical treatment.

Meanwhile, a rest home was built in Pyongyang, and every province is building a new rest home similar to that of the city.

The rest homes each have welfare and medical service facilities, a library, a gym, an amusement hall and a cinema, and the compound of each of the homes is designed for elderly people to take a walk and have a meal outdoors. And the homes are characterized by rooms provided with underfloor heating systems or beds to the elderly's liking. Each of the homes also has a hydroponic greenhouse and a vegetable garden where they can raise vegetables to be used for their own meals. Foreigners can go there to see the elderly leading a happy life under the care of the State. □



Holidaymakers enjoy themselves.



A Coach Runs Full of Beautiful Dreams

IN APRIL LAST, A COACH for children of the Korean Rehabilitation Centre for Children with Disability began to run along the streets of Pyongyang.

Disabled children go to the rehabilitation centre by their exclusive bus on Monday and return home by it on Friday af-

ternoon. Among them is Choe Ryu A, a deaf and dumb child.

Choe was born deaf and dumb. So she was always reluctant to go out, and her parents thought it could not be helped. But she came to have confidence in her life after she began to receive a treatment at a newly-created hearing rehabilitation room of the aforesaid centre.

The room is fully equipped with facilities for the treatment of deaf and dumb children. It also makes and supplies hearing

devices to the children. Choe began to learn the mother tongue wearing a hearing aid from the rehabilitation centre. What she had spoken first was "Thank you."

Thanks to the tireless efforts of the relevant doctors, Choe is now able to communicate fluently with doctors and teachers of the centre. The doctors are now engrossed in the treatment of not only deaf and dumb children but also similar adults.

Pak Kwon Ryong, who was ▶



A coach is in operation for the exclusive use of disabled children travelling to the Korean Rehabilitation Centre for Children with Disability.



► not able to walk properly because of cerebral palsy, has now become able to get on and off the school bus by himself after receiving a treatment in the centre. At first, Pak and his parents would not readily believe that the centre cures disabled children of the diseases. Only after finding that the son began to recover from his disease since receiving a sincere treatment in a physical-treatment room of the centre, his mother, who works at the Songyo District welfare service centre, thanked the doctors and teachers in tears. Kwon Ryong says that it is possible for any disabled person to manage to change their misfortune into fortune in the socialist society.

Nurses, doctors and teachers of the centre are restoring disabled children to normal condi-



Rehabilitation therapies and education are combined to develop disabled children's talent.

tions by making efficient use of varieties of treating methods including those for palm and finger exercises through clay moulding, playing with wooden toy blocks of distinctive colours and a proper walking movement.

In addition, the centre is combining treatment with education so as to develop children's talents. While putting an emphasis on preschool education, it sees to it that recovered children are given education like that for normal children.

On different occasions includ-

ing the national and international days of the disabled, the centre prepares a diversified performance of disabled children, which deeply impresses the audience.

Indeed, all the rehabilitation treatment and education given by the centre make all the children take pride in life and hope for a bright future. The disabled's coach always runs full of their beautiful dreams to and from the rehabilitation centre.

Kim Hyon Ju

Munsu Rehabilitation Centre

NOT LONG AGO I VISITED the Munsu Rehabilitation Centre. Pak Su Jong, an officer of the centre, guided me. The establishment was built under the wise guidance of Supreme Leader Kim Jong Un, the guide said and added that it was opened in December 2013. She referred to it as a general medical treatment base with neuro-surgery, orthopedics and cardiac-rehab departments, modern rooms for varieties of physical treatment and sick-rooms.

Inside the front hall I felt as if I were in a theatre hall. Its ceiling looked like a sky with sparkling stars, and walls of the hall were decorated with glossy edging and tiles of harmonious colours, and with finishing materials of soft colours. Along walls of corridors

in the building were fixed rails on which patients can rely while walking through them.

On the ground floor there were a dispensary, a multipurpose X-ray room, rooms for rehabilitation of the nervous function, and hydrotherapy and orthopedic function departments. According to the guide, patients, who come to the centre, have their diseases diagnosed in the X-ray room before going over to relevant treatment rooms.

The guide led me to the room for rehabilitation of the nervous functions first. I saw cases of cerebral apoplexy there getting treatment for rehabilitation of hand and shoulder joints by means of hand apparatuses or that for rehabilitation of the faculties of seeing and sensing using

objects combined with various models.

Next I went to a room for rehabilitation of everyday-life movements. The room looked like a dwelling. A woman was under the treatment for rehabilitation of hand sense by cooking dishes herself with different utensils. The room also had household furniture, daily necessities and dining tools which I was told patients can use for rehabilitation of their senses.

Then I looked round a room for treatment of children. The room was designed to suit children's psychology. Its ceiling was decorated with paintings of a rainbow, stars and clouds, and a ladder was hung on one of its walls. The guide said that children who visited the centre would often ride ▶

Comprehensive medical service is available for rehabilitation.



► the ladder vying to pick the stars and that the circumstance helped quicken the treatment of children. She went on to say that toys for intellectual development and apparatuses for treatment of children in the room were also effective in the relevant treatment.

The next leg of my visit was a gym, where I met Hyon Chol Ryong, a relevant expert, who told me that the room had latest treatment facilities such as treadmills for adjusting overweight, parallel walker belts for helping patients regain proprioception by using mirror, stairs for treatment and dumbbell treatment devices. I had a talk with a patient from Sinwondong, Pothonggang District, who was getting kinesitherapy for modifying his walking posture. He visited the centre by the bus for the exclusive use of disabled people to get the relevant treatment every day, he said and added with confidence that now he got much better and could walk without the

help of others and that he would soon be able to go to work.

And I went to the hydrotherapy department that runs a hydrotherapy room, a pelotherapy room and a paraffin therapy room. What especially drew my attention was the hydrotherapy room. According to the guide the hydrotherapy is aimed at strengthening muscular power, adjusting functions of joints and restoring balance and walking function by means of senses from buoyancy and temperature of water whose temperature is similar to that of the human body and underwater resistance. The room has vertical and crane lifts by which patients get treatment while sitting on wheelchairs, ultrasonic wave-generating baths and individual baths. There in the room I saw patients doing a pedestrian exercise along an under-water-marked path. I was told that if the exercise was done frequently it would greatly help

strengthen muscular power.

Now upstairs I looked round sick-rooms, a mass exercise room, a cardiopulmonary function rehabilitation room, a room for Koryo therapy and a room for functional diagnosis. In the room for Koryo therapy the guide told me that foreigners as well as Koreans often come to the room. After getting moxa treatment, cupping therapy and manual therapy, she said, they would express their satisfaction, saying that Koryo therapy was the best.

Every facility of the centre made me well aware that the centre is associated with the popular policy of the Workers' Party of Korea that spares nothing for the promotion of the people's health.

At the same time I felt that it is not long before the Korean people will be able to lead a happy, civilized life in better health.

Sim Yong Jin





The thrilling yet graceful scene of Lake Chon.

Eight Famous Scenes on Mt Paektu (4)

The Thrilling yet Graceful Scene of Lake Chon

LAKE CHON ON MT. PAEKTU, THE RISE of the Amnok, Tuman and Songhua rivers, evokes inexpressible fascination and admiration with its mysterious natural phenomena. It is a natural lake located on the highest place in the world: It is 2 190.15 metres above sea level. Covering an area of 9.16 km², the lake is 213.3 metres deep on average and 384 m at its deepest point with 1 955 million cubic metres of water. The lake is frozen for seven months a year. Especially, its water is transparent down to a depth of 16 metres, so when you look into the water, you can see stones of different colours that seem to be within reach and see your face like in a mirror.

The water is so clear that there happen mysterious

phenomena anywhere on the lake. On a windless day the placid lake vividly reflects towering peaks, multifarious sceneries and various kinds of beautiful flowers, so butterflies and other insects and even swifts often swoop down to the lake mistakenly. The inside of the lake's main crater consists of a small basin and precipitous cliffs in the shape of magnolia, the national flower of Korea, and the shape of the lake itself resembles the human heart. What is more mysterious is that the surface of the water rises and falls by about 1.6 metres all the year around.

The lake seen from the top of Mt. Paektu is spectacular, but what happens on and around the lake is more spectacular. Its raging waves resembling those of the East Sea of Korea beat hard against its shores and rocky cliffs, the sounds rending the air, and you can see its sceneries of the four seasons at the same time. And a hot spring gushes out of its bottom, and ►

- hundreds of species of flora and fauna add beauty to its landscape.

The lake's snowscape is also spectacular. When a blizzard wanes and the sun shines, rows of icicles hang down from the tops of ice-roofed Piru Peak and cliffs around the lake, producing all sorts of beautiful sounds. The snow rolling down from the slope of the crater and that thrown up by the wind from the ice on the lake meet and freeze up, forming peculiar snowy shades. And around the hot spring there appears a snowy cave where dozens of people can sit. Streams of water falling down from between the cliffs are frozen up to turn into various ice sculptures, and the morning sunshine or the evening glow spreads over the area with varieties of graceful and mysterious colours as the climax of the snowscape.

The natural wonders of Mt. Paektu become more mysterious with various legends including the following: a Dragon King once lived in the lake; the water of the lake was so clear that 99 fairies would descend down from the Heaven to have a bath there; when the water of the lake swelled, that of Lake Paengnok on Mt. Halla did; and the thunder cracked occasionally over the lake even on a fine day, startling people.

Rhododendron Blooming in Snow

Snow and ice still remain in deep valleys of Mt. Paektu even in mid-summer, like in winter. In such an unfavourable weather rhododendron blooms in the mountain, adding beauty to its landscape. Chairman Kim Jong Il said that because rhododendron of Mt. Paektu blooms in the snow, the flowers are more beautiful, and that the plant is associated with the firm mettle of the Korean people.

The yellow rhododendron of the mountain, which is called *Manbyongcho* in Korean as it is efficacious for all diseases, is well known for its pharmacological ingredients conducive to the health improvement. The leaves of the plant are always green regardless of seasons, and cylindrical in shape, curled up backward. The shape helps them prevent evaporation of their own absorbed water and keep their temperature and nutritious elements. Unlike other flowers, the sap of rhododendron begins to rise in mid-February, the plant sprouts in the snow from March and blooms here and there on the hills of the mountain and the lakeside, striking the people with wonder. So, the Korean people love the plant of Mt. Paektu most of all.

Pak Thae Ho

Rhododendron blooming in snow.



Eight Views of Pyongyang

Enjoying Spring at Ulmil Pavilion

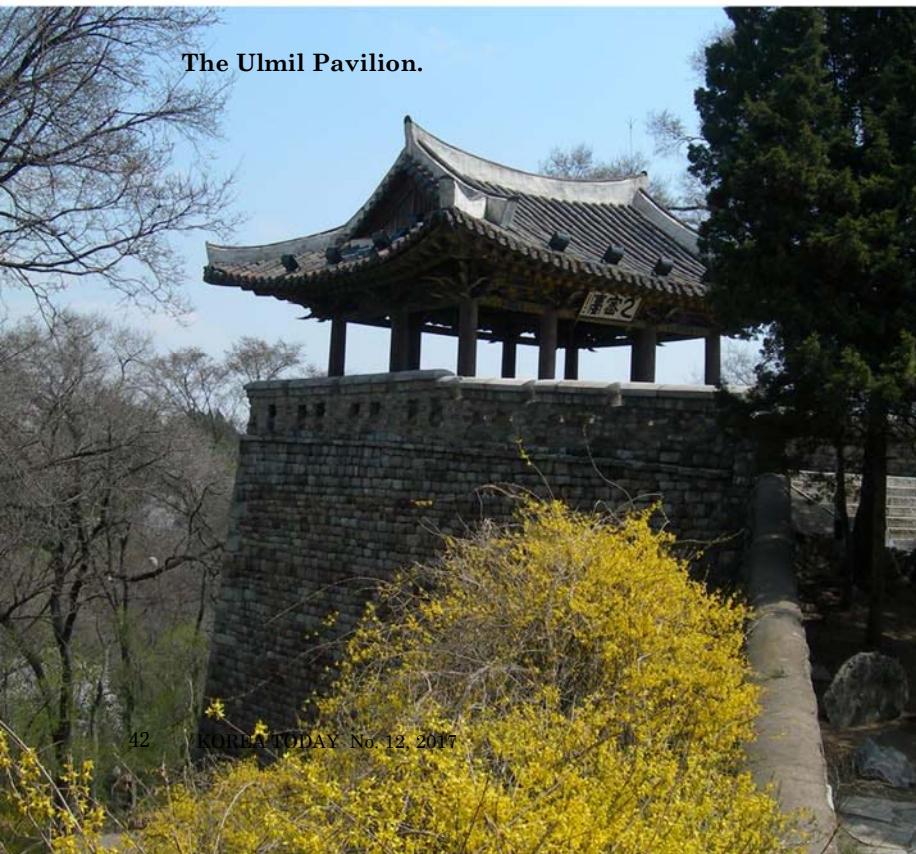
ULMIL PAVILION IS located on Moran Hill, one of the scenic spots in Pyongyang. The name Ulmil is believed to have derived from the legendary tale that a spirit named Ulmil often descended from the heaven to enjoy himself there, or the story that a high-ranking officer of Koguryo (277 BC-AD 668), named Ulmil, fought to defend the place. At first the pavilion was built as northern command post of the inner fort of the Walled City of Pyongyang of Koguryo in the mid-6th century, and was rebuilt in 1714. It also went by the name of Sahojong meaning its location at a scenic spot with open views to all directions. Painted beautifully in different colours, the building

goes well with the surrounding landscape. In particular, its beautiful view in spring arouses unusual thrills, so it was counted as one of the Eight Views of Pyongyang.

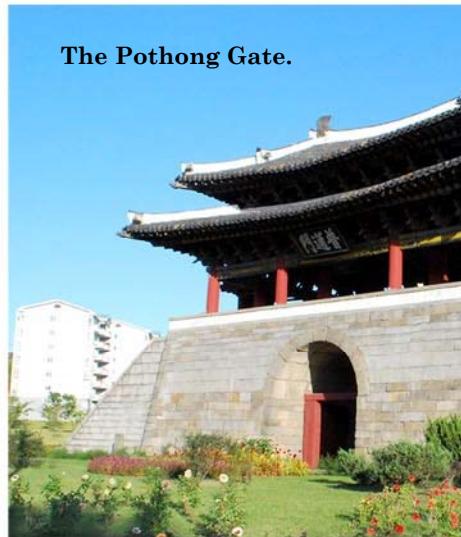
Enjoying Full Moon at Pubyok Pavilion

Pubyok Pavilion stands on Chongnyu Cliff on Moran Hill facing the Taedong River. It was erected as an attachment to the Yongmyong Temple on the hill in 393 by the Koguryo dynasty. It had been called Yongmyong Pavilion until it was renamed Pubyok Pavilion in the early 12th century in the sense that it looks like floating over Chongnyu Cliff that is skirted by the crystal-clear and blue water. As one of the finest ancient pavilions of Korea,

The Ulmil Pavilion.



The Pothong Gate.



it is quite a match with the picturesque scenery around. Enjoying the full moon at the pavilion is so spectacular that it is well known as one of the Eight Views of Pyongyang. Kim Hwang Won, a famous poet in the Koryo dynasty (918-1392), tried to write a poem about the beauty of the place. He wrote *A river meanders along the long wall, hills are standing east of the plain*, but found himself unable to make a good description of the beauty around the pavilion. Lamenting his inability he threw off his brush. The half poem now hangs on a pillar of Ryongwang Pavilion.

Ever-green Ryongsan

Ryongsan was an earlier name of Mt. Taesong. (The mountain began to be called Taesong when there was built a magnificent wall on it to vanquish the invasion of foreign forces.) A group of six ridges sprawls in a circle like an open folding screen, and they are lush with pine trees, so they are invariably green for all seasons. For the unusually attractive scenery the mountain was incorporated in the Eight Views of Pyongyang.



Send-off at Pothong Gate

The Pothong Gate was built by Koguryo in the mid-6th century as part of its capital city of Pyongyang. Since it was the northwestern gate of the walled city its importance in terms of defence and transport was soundly recognized throughout the times of Koguryo, Koryo and the feudal Joson dynasty (1392–1910). In the ancient times the send-off of guests at the gate was quite a scene, so it was listed in the Eight Views of Pyongyang.

Also listed in the Eight Views of Pyongyang are the Buddhist monks visiting the Yongmyong Temple at twilight, the rainfall at the Lotus Pond, the boating in the Taedong River in front of the Nam Gate of the outer fort of Pyongyang, and the whirl of thawing water in the Mathan Shallows of the Taedong River in early spring.

These features contribute to the show of the time-honoured history and natural scenery of Pyongyang.

Ri Song Chol

National Intangible Cultural Heritage (13)

Kayagum Making

KAYAGUM IS A STRINGED instrument peculiar to the Korean nation. They play the instrument by plucking the strings. It is an oblong wooden stringed instrument with 21 strings. It was invented by Uruk, a musician in Kaya (Kumgwan Kaya) in the 6th century, hence the name of the instrument kayagum. At first it had 12 strings.

In the 1960s it was developed into a modern instrument with 21 strings. The making of the instrument has been updated to a certain extent without main changes through a long history. Today's consists of soundbox, strings, mobile bridges, head, tail, pegs, feet and sound hole. And it is designed to be tuned from pentachord to heptachord with a wider sound width.

The making of kayagum mainly consists of two processes, that is, the one of selecting and sawing the timber, and the other

of drying and assembling. The upper board of kayagum is made of paulownia wood with relatively sparse growth rings as required by its role of sounding while the back board, which serves as a vibration body to reflect the sound, is made of chestnut, black walnut or jujube wood. Generally, a thirty-odd-year-old tree is good. Parts of the instrument are made separately to be assembled. Then it is painted in such a way as to leave the grain of the wood intact, and is fixed with strings of twisted silk thread.

The instrument is elastic and its sounds are soft and graceful. It is simple in structure and easy to tune with mobile bridges, and can be played in a diversified manner. It is also easy to learn to play, so it is widely disseminated. Kayagum is used as a solo instrument and a melodic and rhythmic instrument in orchestra, instrumental ensemble and accompaniment.

In particular, it plays a big role in adding taste and flavour of the Korean nation to mixed orchestral music.

Rim Ok



Mural Pictures of Golden Hall Disappear

FROM ANCIENT TIMES, Korean people went over to Japan to pass on their advanced technology and culture to the Japanese. They did so more actively in the periods of Koguryo, Paekje and Silla.

The Horyuji Temple of Japan was built for eight years by Korean architects who went over from Paekje in 607. The temple consists of (centre) Golden Hall, a five-storeyed pagoda, an inner gate, corridors, a lecture hall and many other buildings.

Among them, Golden Hall was the most magnificent and artistic. This was why the work of painting murals on interior and exterior walls of the hall could not be assigned to any ordinary painter. So when the temple was completed, the Japanese repeatedly asked Koguryo to send a competent painter.

At last their request was accepted, and Tam Jing, a famous painter and priest of Koguryo, was selected to go over to Japan. In March 610 a boat was sailing through waves toward Japan. Aboard the boat was Tam Jing, who was looking thoughtfully at the landscape of his country fading away. The image of the sturdy, handsome man majestically standing in a priest's robe demonstrated a triumphant spirit. In the

warm spring sun the boat went as fast as an arrow toward Japan.

As soon as the boat reached the destination the head and other priests of the temple welcomed Tam Jing. Since then he began to paint murals on the walls of Golden Hall. In those days, he also disseminated to the Japanese Koguryo's advanced technology and culture, displaying the honour and stamina of his country. He taught them how to paint and how to make paper and ink. When the Japanese saw a water mill he had made, they lavished respectful praise on him.

At last, the murals were completed after his tireless efforts. "Ah! They are really great pictures!" someone cried without restraining himself as if he had forgotten where he was.

The murals were majestic indeed: The Buddha sits on a lotus cushion flanked by the Buddhist Goddess of Mercy and another Bodhisattva; countless lotus flowers painted on spaces of the fine walls seem to emit fragrance floating lightly in a wind; impressive are the Buddha's soft, dignified countenance, beautiful and noble images of Bodhisattvas and the thin drapery of their robes that seem to flutter even in breath; and the red and black strong lines seem to demonstrate

a valiant spirit of man, and other paintings of green, blue, red, yellowish brown and grey colours reflect the beautiful landscape as it is.

Indeed, the pictures seemed to vividly show the world of Buddhism on the earth, not in an illusion. They also reflected Tam Jing's lofty patriotism.

Later the murals became well known as one of the three great objects of Oriental art across the world. As works of importance not only in the Eastern art history but also in that of the world art, the murals were the historic works of art which adorned the first page of Japan's history of pictorial art.

The murals covered all the twelve walls of the hall, and the best of them were those on the 6th and 2nd walls. These pictures were still kept intact for over a thousand and several hundred years after their creation, being regarded as the best of their kind in the world and part of the world treasure.

But they disappeared when the temple was burnt in 1949. In 1968, lots of first-class painters in Japan painted the same pictures on the walls of the hall rebuilt after the origin, but they recognized that theirs were not as good as the original.

Choe Sol Mi

Royal Tomb of Koryo Newly Discovered



The entrance to the
burial chamber.



The interior of the
burial chamber.

IT IS AN INVARIABLE policy of the Workers' Party of Korea to enrich the national cultural heritage and preserve them well by unearthing more historical relics and remains. Accordingly, the Democratic People's Republic of Korea is intensifying the relevant surveys and studies to find out new historic relics and remains. In the course of this, the tomb of Sukjong, the 15th king of Koryo (918–1392), was unearthed in August 2017.

The Korea National Heritage Preservation Agency studied many archives including *Koryosa* (History of Koryo Dynasty), analysed space distribution features on the spots where mausoleums of kings of Koryo might have existed by applying the space information technology based on satellite images, and succeeded in confirming the exact location of a mausoleum. The relevant researchers and excavation team, in cooperation with researchers of the Na-

tional Heritage Preservation Office and the Koryo Museum in Kaesong City, conducted concrete survey, exploration and excavation of the place for over 20 days from May to June this year to find out the mausoleum.

Sukjong was the third son of Munjong, the 11th king of Koryo. His name was Wang Ong and he was on the throne for a decade from 1096 to 1105. The word *Sukjong* is Wang Ong's posthumous name. The site of the mausoleum is located on the slope of a low hill three kilometres west of the seat of Sonjok-ri, Kaesong. It is 29 m long from south to north and 13 m wide from east to west. It is divided into three sections by four east-west embankments.

The first section in the north has a burial chamber, a platform of the mound above the chamber and a round mud wall at the back of the mausoleum. The chamber is a half-underground structure built by well-trimmed granite

monoliths in two layers. The second and third sections have two stone statues of civil servants and military officers standing face to face with each other in a symmetrical way, at the intervals of about six metres from east to west. Unearthed there were also pieces of gilt edges of the wooden coffin showing the character of the mausoleum and its features at that time, a handle of a bronze spoon in the period of Koryo, pieces of dragon- and phoenix-patterned antefixes, and pieces of dragon head-patterned roof tiles.

The Archaeological Society of the DPRK ascertained on the spot that the unearthed was the mausoleum of the 15th king of Koryo. The relic is part of the nation's precious heritage that is of great significance in newly illuminating the developed culture of Koryo, the first unified state of the Korean nation.

Kim Yu Jin

Infamous for Damaging Global Environment

AN UNPRECEDENTED concern is rising around the world about how to deal with the ever worsening global warming. As part of the effort 195 nations have signed the Paris agreement on climate change that was adopted in December 2015.

The US, however, is sailing against the current, challenging the global struggle for avoiding the global warming. When the Kyoto protocol was adopted in 1997 binding the developed countries to cut the greenhouse gas emission, the Americans refused to ratify the protocol arguing that the exclusion of the developing countries from the duty of the greenhouse gas emission was unfair and that they could hardly let China, India and other newly emerging economic giants benefit from the protocol at the expense of the blow to the American economy. In 2001 they unilaterally quit the protocol. And on June 1 this year the White House formally declared its withdrawal from the Paris agreement on the climate change for the absurd reason that it is unfair and brings damage to the Americans.

Criticizing the selfish approach even the American allies like France, Germany and Canada, to say nothing of the developing countries, have made sharp denunciation, calling it "avoidance of the global responsibility," "error that foils the future of our planet," and "gross illegality against humanity," and expressing their stand to cope with the development resolutely.

Even inside the US the President's decision to withdraw from the Paris pact has been strongly scathed as shortest-sighted deci-

sion in the American history and dangerous act that drives the US to suicide.

As a matter of fact, the US is as advanced as any other country in wrecking the ecological environment of the earth. Already in the first half of the 20th century it became the country that was emitting the largest amount of greenhouse gas in the world by introducing the economic mode of mass consumption and mass disposal, and since the end of the Cold War it has pressed a lot of developing countries to introduce the American model of development, which has exacerbated the environmental destruction around the world.

The volume of greenhouse gas emitted by the US rose over 16 percent between 1990 and 2005, and it accounted for 22.1 percent of the global amount in 2004. The environmental destruction due to the American ambition for military dominance is far surpassing the damage that is coming from economic activities.

Since it used an atomic bomb for the first time the US had conducted as many as 1 000 nuclear tests by the early 1990s, terribly destroying the ozone layer, the umbrella for protection of lives on the earth, and the ecological environment. In 1954–1956 it made more than 20 nuclear tests in the two coral atolls of Bikini and Enewetak in the Marshall Islands, turning the area seriously radioactive-polluted. Last year the world was shocked when the secret was made open that the US left a lot of radioactive waste uncared-for after it dismantled the Camp Century base in the icebergs near Greenland.

During the Iraq war in 2003

the US military used 100-200 tons of depleted uranium shells, which have critical effects on human health and environment, and in 2015 they fired 5 265 armour-piercing 30mm-calibre shells, which contain depleted uranium, in the Syrian territory on the pretext of hitting the ISIS targets.

The US used a lot of biochemical weapons in the Korean war in the 1950s and the Vietnam war in the 1960s, and it has been running amock preparing a biochemical war in the 21st century. In 2015 it made an anthrax experiment in the Osan air force base in south Korea. Anthrax is known to have a 95 percent killing power and cause a huge environmental damage. The US military keeps biological war bases, dubbed as "biological laboratories," in different places around the world.

Thousands of American military bases and facilities deployed in more than 140 countries and regions are releasing all kinds of harmful materials like waste oil, chemical substances and heavy metals, contaminating the soil and water in the localities.

Refusing to face the fact that it has devastated the human habitats seeking extreme avarice and a wild dream of conquest of the world, the US is obstructing the global endeavour for prevention of global warming and denying its obligation. This is another crime of environmental destruction, which comes from the Americans' hereditary quality of shamelessness. They think the world is there for the US, not that the US is part of the world.

Rim Hye Gyong

American Nuclear Crimes Denounced

ASHTON CARTER, FORMER US Secretary of Defense, once said that the US had prepared a war with Korea since 1953, constantly enhancing the relevant ability. Promoted to the post after assistant secretary, undersecretary and vice secretary of defense, he had been more deeply engaged in making a military policy against Korea than anybody else. So, it is needless to doubt whether his words are true or not.

Since its military occupation of south Korea in 1945, the US has made desperate efforts to make Korea collapse by means of force. The force was just nuclear weapons, and the very course of trying to carry the scheme into effect is a history of Washington's nuclear crimes against Korea.

During the Korean war (June 1950-July 1953) unleashed by the US, the invaders planned to drop A-bombs in Korea. In November 1950 Truman, the then president of the US, overtly referred to the attempt to use A-bombs in the war. Eisenhower, too, issued a statement in which he said that action was better than negotiation and that they did not mind using even A-bombs. This resulted in appearance of A-bomb refugees in Korea, and they are still in agony unable to have reunion with their relatives there.

The US signed the armistice agreement after suffering a disastrous defeat in the war. It, however, did not give up the dream of stifling Korea by means of nukes.

In August 1953 just after the armistice the US strategic air force command drew up Opera-

tions Plan 8-53, the gist of which was dropping of A-bombs in Korea and China. In the following year the heads of the Department of State, the Department of Defense, the Joint Chiefs of Staff, the CIA and the US land, sea and air forces met and worked out an operations plan aimed at making nuclear attacks against military establishments in Korea and different areas of China in an emergency on the Korean peninsula. For the purpose of realizing the plan the US officially announced the start of arming the GIs in south Korea with nukes in July 1957, regardless of the Korean Armistice Agreement on total stop of hostile military actions in Korea.

According to a book issued by the State Department, the US deployed an Honest John nuclear missile unit and a pentomic atomic division in south Korea in early 1958, and armed a US air unit there with nuclear-tipped Matador missiles to stage a nuclear war rehearsal in the 1960s.

In the 1970s the US shipped into south Korea varieties of nuclear warheads like Sergeant, Lance missiles and other means of nuclear striking, and in the 1980s, chattering about "power superiority," it sited medium-range nuclear missiles on GI bases there and transferred tactical nukes from Okinawa of Japan to south Korea.

Then Washington openly revealed their intention of imposing a nuclear holocaust on the Korean nation by deploying in south Korea even N-bombs known as devil weapons of the 20th century.

Totally the US deployed over

1 000 and more than 1 720 nukes in south Korea in the 1970s and the 1990s respectively. Not content with this it stages joint military exercises based on a simulated nuclear war in and around south Korea every year. Such kinds of US-south Korea joint nuclear war rehearsals started with the Focus Retina operations in 1969. They have been staged for decades, the title changing into Freedom Bolt, Team Spirit, RSOI, Key Resolve, Foal Eagle and Ulji Freedom Guardian. These aggressive war exercises have badly affected the economic construction and people's livelihood in Korea. Since it was clear that as long as the US threatened Korea with nukes the latter could hardly build a prosperous, powerful socialist state, Korea took a self-defensive measure.

On February 10, 2005 the DPRK Ministry of Foreign Affairs officially declared the country's possession of nukes. In 2006 the country succeeded in an underground nuclear test. In 2009 it was aired across the world that the country succeeded in the second similar nuclear test. Three years after the successful third underground nuclear test, it succeeded in the test of its first H-bomb. In September last it achieved a complete success in the test of a H-bomb to be mounted on an ICBM. This put an end to the history of the US's unilateral nuclear threat and blackmail, ushering in an era in which the US languishes in a terrible nuclear nightmare—an inevitable result for the US as a nuclear criminal.

Kim Il Bong

Tragedy of Japan

IT IS OVER 70 YEARS since Japan was defeated on August 15, 1945 after occupying Korea militarily. The Japanese aggressors, during their 40-odd-year-long military rule of Korea, murdered more than 1 million innocent Koreans and took and forced over 8.4 million other young and middle-aged Koreans into slave labour. They also used 200 000 Korean women as sexual slaves for the Japanese army, cruelly raping and mercilessly killing them. Far from making reparation for its blood-stained criminal history of inflicting tragic damage and sufferings on the Korean people, Japan does not loose even a word of apology.

When people mourn the innocent war victims, high-ranking officials and politicians of Japan throng the Yasukuni Shrine where the departed souls of war criminals, who took away those victims' lives, drift. They have handed to their younger generation new textbooks which distort the aggressive war as "a war of justice," and their predecessors' colonial rule over other nations as "cooperation" and "contribution" for development and prosperity. And while making vociferous propaganda about so-called "threat" from Korea, they are wild about a sanction campaign against Korea and suppressing the General Association of Korean

Residents in Japan and Korean residents, fanning up the extreme hostile feelings and hatred against the country.

Then, what is the intention of Japan's present ruling circles that beautify and justify its history of aggression and infuse its society with militarism?

It is a well-known fact that whenever Korea took measures for strengthening its self-defence capability, Japan made a fuss about them, talking about so-called "threat." On the pretext of Korea's test fire of ballistic missiles, the Japanese authorities went so far as to deploy interceptor missiles for use at all times in the compound of their government building, consecutively organized the exercises for moving and deploying Patriot interceptor missiles and mobilized even civilians to conduct evacuation training.

Japan's attitude shows that it attempts to realize its ambition of reinvading Asian countries with Korea as a springboard. Actually, the Japanese authorities have strengthened their military capability finding fault with Korea's measures taken to cope with the US's scheme to occupy the country militarily. Thus Japan has prepared aggression forces like today's.

But Japan is mistaken. Ambition is one aspect and its fulfil-

ment is another. Their ambition is just a preposterous daydream before Korea whose comprehensive national power and strategic position have reached a new stage. Korea is not as weak as in the past. At that time Japan could suppress and occupy Korea for decades by means of cannons against the latter's matchlocks, but today it must not act imprudently before the latter which is possessed of diversified weapons.

Last century Korea was possessed of strategic weapons for self-defence, but now it manufactures and launches artificial earth satellites, and has ICBMs that can strike mercilessly its enemies anywhere in the world. This has resulted in a complete change in the strategic landscape of the Asia-Pacific region and that of the world. If it neglects the fact, Japan should understand, it will be an act of suicide causing its self-destruction. It is just a tragedy of Japan that the insular country is running amok without trying to understand the fact.

The Japanese authorities should see the reality squarely and clearly understand that it is inevitable for them to change its policy of hostility towards Korea and set out to liquidate the past related to the country.

Kim Il Bong

Quadrangular Nine-storey Pagoda in Pohyon Temple

IN MT. MYOHYANG, ONE of the scenic spots in Korea, there is the Pohyon Temple from the period of Koryo (918–1392). A

quadrangular nine-storey pagoda stands in front of the Manse Pavilion in the temple. Built of well-trimmed light-grey granite the

pagoda is six metres high. Characters inscribed on the back of the body of the first storey show that it was built in 1044. Under the pagoda is laid two layers of stone slabs that support its podium.

The podium is elaborately decorated with various lotus flower patterns. Such a kind of formation is one of the specific features of pagodas from the period of Koryo, and it adds a formative and artistic value to the pagoda. Each side of the cornerstone is 3.55-m long.

The body of the pagoda consists of nine stories, and it tapers off gradually from the bottom upward. A groove is cut into the edge of each body stone—this is a rare style. The surface of the roof stone is steep, and the eaves are comparatively thin and slightly raised at both ends. Traces of hanging wind-bells remain in each angle rafter.

The pagoda is preserved as a national treasure.



Kim Un Jong

