## INTERNATIONAL ATOMIC ENERGY AGENCY (IAEA)

#### Board of Governors

In accordance with the statute and the existing practice, the Board is responsible for approving safeguards procedures and safeguards agreements, and for the general supervision of the Agency's safeguards activities. The board generally meets five times a year: March, June, before and after the regular session of the General Conference in September, and immediately after the meeting of its Technical Assistance and Cooperation Committee in December. At its meetings, the board also examines and makes recommendations to the General Conference on the IAEA's accounts, program, and budget and considers applications for membership.

The Board of Governors has 35 members, of which 13 are designated by the board and 22 are elected by the General Conference.

The elected Member States on the board for 2023-2024 are: Algeria, Argentina, Armenia, Australia, Bangladesh, Brazil, Bulgaria, Burkina Faso, Canada, China, Costa Rica, Denmark, Ecuador, Finland, France, Germany, India, Indonesia, Japan, Kenya, Republic of Korea, Namibia, Netherlands, Paraguay, Qatar, Russian Federation, Saudi Arabia, Singapore, South Africa, Spain, Türkiye, United Kingdom of Great Britain and Northern Ireland, United States of America, Uruguay, and Ukraine.

#### **Developments:**

**2024:** The Chair of the Board of Governors for 2023-2024 was Ambassador Holger Federico Martinsen of Argentina.

The Board of Governors convened from 4-8 March. Director General Grossi updated the Board on the work of the Support and Assistance Mission to the ZNPP (ISAMZ) to address the "precarious" situation at the Zaporizhzhya Nuclear Power Plant (ZNPP). Additionally, he expressed "serious concern that Iran has unilaterally stopped implementing the Joint Statement" agreed to by the IAEA and Iran. He welcomed a potential renewal of dialogue with Syria and expressed excitement for the upcoming Nuclear Energy Summit in Brussels.

The Board <u>convened</u> on 11 April for an emergency meeting on the situation at the Zaporizhzhia nuclear power plant. Director General Grossi updated the Board on the direct attack against the Zaporizhzhya Nuclear Power Plant (ZNPP). He noted that the attacks, which struck one of the reactor domes, "fortunately did not compromise nuclear safety in a serious way," but nonetheless represent a violation of the five principles established to ensure nuclear safety in Ukraine. He called on all parties to exercise "maximum restraint" and to observe the five concrete principles.

**2023:** The Chair of the Board of Governors for 2022-2023 was Ambassador Ivo Sramek of the Czech Republic.

The Board of Governors <u>convened</u> for the first time in 2023 from 6-10 March. In his opening statement, Director General Grossi noted "important" steps taken by Iran to increase cooperation with the IAEA on safeguards issues. Additionally, he provided updates on the situation in Ukraine, underlining a <u>document</u> produced by the Agency detailing the nuclear safety, security and safeguards in Ukrainian nuclear power plants. Finally, he provided updates on the

Agency's efforts in promoting nuclear technology, including in the area of water analysis.

On 10 March the Board <u>reappointed</u> Director General Rafael Grossi for a second term.

The Board <u>convened</u> from 5-9 June. Director General Grossi outlined his five principles for ensuring nuclear safety and security at the Zaporizhzhya Nuclear Power Plant (ZNPP), characterizing his report of these principles to the UNSC as a "step in the right direction." Additionally, he noted that progress in the situation in Iran has not progressed "at the level, pace and sustained rhythm that I would expect." Finally, he underlined progress in technical consultations on the issue of naval nuclear propulsion.

The Board met again from 11-15 September. The recent earthquake in Morocco became a topic of discussion, with Director General Grossi offering the IAEA's support in handling the aftermath. Director General Grossi then provided updates on the controlled release of water from the Fukushima Daiichi Nuclear Power Station beginning on 24 August. He additionally expressed concern over an "increase of military activity around the Zaporizhzhya Nuclear Power Plant." Finally, he announced the launching of the new Atoms4Food initiative, which aims to promote nuclear applications in the field of agriculture.

On 28 September the Board <u>elected</u> 11 new members (Algeria, Armenia, Bangladesh, Burkina Faso, Ecuador, Indonesia, Republic of Korea, Netherlands, Paraguay, Spain, and Ukraine).

The Board's <u>final meeting</u> in 2023 took place from 20-24 November. In his opening statement, Director General Grossi listed the Agency's achievements in promoting peaceful nuclear technology, including through the new Atoms4Food initiative. He also stressed the importance of nuclear energy in addressing climate change. Finally, he provided brief updates on the situations in Ukraine, Iran, and North Korea.

**2022:** The Chair of the Board of Governors for 2021-2022 was Ambassador Shin Chae-Hyun of the Republic of Korea.

The Board of Governors met on 2 March to discuss nuclear safety, security, and safeguards in Ukraine after Russia's invasion of the country on 24 February. Director General Grossi called for all parties to exercise restraint, expressing concern over military activity surrounding the Zaporizhzhya Nuclear Power Plant (ZNPP) and Chornobyl Exclusion zone. Finally, he noted that "best action to ensure the safety and security of Ukraine's nuclear facilities and its people" would be an end to war.

The Board convened from 7-11 March. Director General Grossi updated the Members on the Agency's efforts to address the "unprecedented danger of a nuclear accident" caused by the war in Ukraine, expressing serious concern over a missile strike near Zaporizhzhya Nuclear Power Plant. Additionally, he reported "constructive talks" with Iran on safeguards issues, achievements in Technical Cooperation programs, and the first mission of the Fukushima ALPS Task Force to determine the safety of releasing water from the Fukushima Daiichi power plant.

The Board met for its second scheduled meeting from 6-10 June. Firstly, Director

General Grossi welcomed Saint Kitts and Nevis, and Tonga as new Member States of the IAEA. He then outlined the Agency's plan for addressing nuclear issues in Ukraine, including providing Ukraine assistance under the IAEA's Response and Assistance Network. In order to accurately assess the situation in Ukraine, he <u>called</u> for an IAEA led mission to the Zaporizhzhya Nuclear Power Plant. He additionally provided updates on the IAEA's Annual Report for 2021, technical cooperation programs, and the situations in Iran and the DPRK.

The Board convened again from 12-16 September. Director General Grossi reported the outcome of the IAEA Support and Assistance Mission to Ukraine's Zaporizhzhya Nuclear Power Plant (ISAMZ), noting that safety and security at the power plant had been undermined. He called for the establishment of a nuclear safety and security protection zone around Zaporizhzhya to prevent a nuclear accident. He additionally underlined other efforts undertaken by the Agency, including addressing climate change, engaging AUKUS parties on safeguarding naval nuclear propulsion, and monitoring the situations in Iran and the DPRK.

On 29 September the Board <u>elected</u> 11 new members (Brazil, Bulgaria, Costa Rica, Denmark, Kenya, Namibia, Qatar, Saudi Arabia, Singapore, Türkiye, and Uruguay).

The Board <u>convened</u> for a final time from 14-18 November. Director General Grossi began his opening statement by enumerating the Agency's efforts in combatting climate change. He then reports on the ongoing efforts to ensure nuclear security in Ukraine, noting the arrival of the third Support and

Assistance Mission to Zaporizhzhya Nuclear Power Plant (ISAMZ). He responds to Russian accusations of Ukraine producing a dirty bomb, stating that "the Agency did not find any indications of undeclared nuclear activities or materials aimed at the development of radiological dispersal devices" at three locations in Ukraine. Finally, he provided updates on the situations regarding AUKUS, Iran, and the DPRK.

**2021:** The Chair of the Board of Governors for 2020-2021 was Ambassador Heidi Alberta Hulan of Canada.

The Board of Governors convened for its first meeting of 2021 from 1-5 March. Director General Grossi highlighted the achievements of the IAEA in supporting State's pandemic responses, including through the Zoonotic Disease Integrated Action (ZODIAC) program and testing assistance. Additionally, he provided an update on the situation in Iran after the country announced its intentions to end compliance with its JCPOA commitments on 23 February. He noted both a new "temporary bilateral technical understanding" and the presence of "nuclear material and/or equipment contaminated by nuclear material" at a location in Iran. Finally, he expressed concern over the DPRK's nuclear program.

The Board convened the second time from 7-11 June. Director General Grossi underlined several key areas of Technical Cooperation, including cooperation provided in response to a volcanic eruption in St. Vincent and the Grenadines. Additionally, he provided further updates on the situation in Iran and the DPRK.

The third meeting of the Board was held on 13-17 September. Director General Grossi reported "constructive developments" regarding the situation in Iran, including an agreement to allow access for inspectors at one facility. He continued to express concern over the DPRK's nuclear program, noting indications that a new 5-megawatt (MW) reactor may be operating in the country.

On 23 September the Board <u>elected</u> 11 new members (Burundi, Colombia, the Czech Republic, Finland, Guatemala, Ireland, the Republic of Korea, Libya, Pakistan, Slovenia and Viet Nam).

The Board met for the final time in 2021 from 22-26 November. Director General Grossi provided <u>updates</u> on the Agency's Technical Cooperation achievements. Additionally, he reported that the Agency's negotiations with Iran on their nuclear commitments "proved inconclusive." Finally, he expressed concern over construction at the Yongbyon nuclear facility in North Korea.

**2020:** The Chair of the Board of Governors for 2019-2020 was Ambassador Kumlin Granit of Sweden.

The Board of Governors convened for the first meeting of 2020 from 9-13 March. In his opening address, Director General Grossi underlined the IAEA's efforts in assisting Member States in responding to the COVID-19 pandemic. Additionally, he updated the Board on the completion of the LEU bank in Kazakhstan, Iran's refusal to allow the IAEA access to certain nuclear facilities, and efforts to be prepared to implement safeguards in the DPRK should a safeguards agreement be reached. Finally, he highlighted several new initiatives he

intends to pursue in his role, including gender parity programs.

The second meeting of the Board of Governors in 2020 took place from 15-19 June. Director General Grossi <u>updated</u>
Member States on the IAEA's response to the COVID-19 pandemic, including the launch of the Zoonotic Disease Integrated Action (ZODIAC) program. Additionally, he expressed "serious concern" over Iran's continued refusal to allow safeguards inspectors access to several locations. In response to these reports, the Board adopted a resolution (GOV/2020/34) calling on Iran to comply with IAEA safeguards.

The Board convened for a third time from 14-18 September. Director General Grossi updated the Board on progress in the modernization of nuclear application laboratories in Seibersdorf. Additionally, he noted the agreement reached between Iran and the IAEA, allowing safeguards inspectors to access one of the two previously blocked locations.

On 24 September the Board <u>elected</u> 11 new members (Argentina, Austria, Egypt, Malaysia, Mexico, New Zealand, Peru, Poland, Senegal, Switzerland, United Arab Emirates).

The Board held its final meeting of 2020 from 16-20 November. Director General Grossi <u>highlighted</u> the achievements of Technical Cooperation programs, despite challenges presented by the COVID-19 pandemic.

**2019:** The Chair of the Board of Governors for 2018-2019 was Ambassador Leena La-Hadid of Jordan.

The Board of Governors convened on 4-8 March in Vienna for its first meeting of the

year. In his <u>opening address</u>, Director General Amano provided updates on the IAEA's LEU bank in Kazakhstan, the verification of Iran's compliance to its commitments under the JCPOA, and the monitoring of the DPRK's nuclear program using open source information.

The Board of Governors convened for its second meeting of 2019 in Vienna from 10-14 June. In his <u>opening statement</u>, Director General Amano noted the IAEA's progress in supporting cancer therapy through the Programme of Action for Cancer Therapy (PACT). He also expressed concern over the "increasing tensions over the Iran nuclear issue," calling for Iran to "fully implement its nuclear-related commitments under the JCPOA."

On 18 July, Director General Yukiya Amano of the International Atomic Energy Agency passed away. His passing was announced by the IAEA on 22 July.

On 25 July, the International Atomic Energy Agency Board of Governors named former Chief IAEA Coordinator and Assistant Director General Cornel Feruta acting Director General of the International Atomic Energy Agency.

The Board of Governors convened from 9-13 September. Acting Director General Cornel Feruta <u>updated</u> the Board on safeguards applications in Iran and DPRK.

On 30 October the Board appointed Ambassador Rafael Mariano Grossi of Argentina as the new Director General of the IAEA. Grossi took office on 2 December, following approval from the General Council.

The Board of Governors convened for the final time in 2019 from 21-22 November.

Acting Director General Feruta <u>underlined</u> the importance of the IAEA's Technical Cooperation projects in areas of cancer research, agriculture, and climate change. Additionally, he updated the Board on Iran's nuclear activities, calling on Iran to "provide full and timely cooperation with the Agency in implementing its Safeguards Agreement and Additional Protocol."

**2018:** The Chair of the Board of Governors for 2017-2018 was Ambassador Darmansjah Djumala of Indonesia.

On March 5-9, the Board of Governors convened in Vienna, Austria. Director Amano stated that Iran is meeting its nuclear-related commitments and the IAEA has access to all necessary sites. The Board will also consider the 2018 IAEA Nuclear Safety Review and the 2018 Nuclear Technology Review.

From 4-8 June, the Board of Governors met in Vienna for its second meeting of the year. Director Amano addressed the Board on the subject of North Korea, inspections of Iranian facilities under the Additional Protocol and JCPOA, and highlighted sustainable development projects undertaken by the IAEA.

From 10-14 September, the Board of Governors met in Vienna for its third meeting of the year. Director Amano reaffirmed Iranian compliance with the JCPOA, called on North Korea to comply with its UN obligations, and highlighted the IAEA's *Nuclear Security Report 2018*. On 24 September, the Board of Governors met in Vienna for its fourth meeting of the year, a week after the annual meeting of the General Conference. Eleven new board members were elected during this meeting.

From 19-23 November, the Board of Governors met in Vienna for its fifth meeting of the year. The meeting addressed the IAEA's technical cooperation projects, Iranian verification and monitoring activities, and the IAEA's LEU bank in Kazakhstan.

**2017:** The Chair of the Board of Governors for 2016-2017 was Ambassador Tebogo Seokolo, Governor of South Africa

On 6-10 March, the Board of Governors convened in Vienna, Austria. The Board considered a number of documents, including the *Nuclear Safety Review 2017*, the first draft of the *IAEA Nuclear Security Plan 2018-2021*, and the *Nuclear Technology Review 2017*. In his statement to the Board, Director General Yukiya Amano underlined the importance of nuclear safety and verification by the IAEA as reliance on nuclear energy and technology grows.

On 8 March, the IAEA Board of Governors reappointed Director General Yukiya Amano.

On 25 September, the IAEA <u>elected</u> the Governor of Indonesia, Ambassador Darmansjah Djumala, as the Chairman of the IAEA's Board of Governors for 2017-2018, replacing Ambassador Tebogo Sekolo of South Africa.

On 20-24 November, the Board of Governors <u>convened</u> in Vienna, Austria. The Board addressed verification and monitoring activities in Iran, the progress of the IAEA LEU Bank in Kazakhstan, and other IAEA projects. Director General Amano stated that the LEU procurement process is at an advanced stage, and the IAEA will issue a Request for Proposal soon.

**2016:** The Chair of the Board of Governors for 2015-2016 was Ambassador Laércio Antonio Vinhas, the Governor of Brazil.

On 16 January, IAEA Director General Yukiya Amano submitted a <u>report</u> to the Board of Governors and UNSC confirming Iran's compliance with Annex V of the JCPOA, marking Implementation Day for the nuclear agreement.

On 19 January, the Board of Governors met at the <u>request</u> of Director General Yukiya Amano to discuss the implementation, verification, and monitoring of the JCPOA post-Implementation Day.

On 6-10 June, the Board of Governors met in Vienna, Austria. Several accomplishments from 2015 were highlighted, including the JCPOA, an increase in peaceful nuclear energy production, and the entry into force of the CPPNM.

On 19-23 September, the Board of Governors <u>convened</u> in Vienna, Austria for their September meeting. In his <u>opening</u> <u>statement</u>, Director

General Yukiya Amano highlighted IAEA research on the Zika Virus, nuclear energy production, and condemned the actions of North Korea regarding adherence to the NPT.

On 14-18 November, the Board of Governors <u>convened</u> in Vienna, Austria. In his opening <u>statement</u>, Director General Amano addressed the Agency's Technical Cooperation Programme, the continued efforts to aid countries affected by Zika Virus, and verification and monitoring activities in Iran.

**2015:** The Chair of the Board of Governors for 2014-2015 was Governor from Slovakia, Ms. Marta Žiaková.

On 2-5 March, the Board of Governors met in Vienna. Director General Yukiya Amano addressed the meeting and talked about important issues on the IAEA's agenda, including nuclear safety, nuclear security, nuclear energy, supply assurance, nuclear applications, technical cooperation, safeguards in Iran, North Korea, as well as Syria, and the 2015 NPT Review Conference. The Board discussed IAEA's activities related to nuclear safety and security, nuclear science and technology, as well as nuclear verification. The Board also approved a new project using nuclearderived diagnostic techniques to improve diagnosis of zoonotic diseases.

On 8-12 June, the Board of Governors met in Vienna. Director General Yukiya Amano delivered an introductory <u>statement</u> and talked about issues including technical cooperation, nuclear applications, nuclear energy, nuclear safety, nuclear security, and so forth. He also spoke about safeguards issues and the outcome of the 2015 NPT Review Conference. The IAEA Secretariat <u>presented</u> Safeguards Implementation Report 2014 to the Board.

On 25 August, the Board of Governors convened a special meeting to consider the implications of UN Security Council Resolution 2231 (S/RES/2231 (2015)). In his introductory statement and report, the Verification and Monitoring in the Islamic Republic of Iran in light of United Nations Security Council Resolution 2231, the Director General Yukiya Amano outlined the implications for the Agency concerning the

verification and monitoring of Iran's commitments under S/RES/2231 and the Joint Comprehensive Plan of Action (JCPOA). The report also sets out the procedures for the information exchange between the Agency and the Joint Commission, as well as the additional estimated amount of funding needed for additional resources prior to, and subsequent to the "Implementation Day," including the preparatory, verification and monitoring activities, inspector costs and for the provisional implementation of the Additional Protocol. The Director General will also provide his final assessment on all the past and present outstanding issues outlined in GOV/2011/65 Annex, on 15 Dec 2015.

The Board of Governors proceeded to <u>authorize</u> the Director General Yukiya Amano to implement the verification and monitoring activities set under the <u>JCPOA</u>, approved changes to the IAEA's programme and budget, and agreed to seek the additional resources of

€9.2 million (per year) for the implementation of the verification and monitoring activities outlined under the JCPOA.

On 6-10 September, the Board of Governors met for its third yearly meeting in Vienna. In his <u>introductory statement</u>, Director General Yukiya Amano discussed issues concerning nuclear safety, nuclear security, nuclear energy, assurance of supply, nuclear applications, technical cooperation and nuclear verification.

The Director General submitted reports on the *Fukushima Daiichi Accident*, the

Progress in the Implementation of the IAEA Action Plan on Nuclear Safety, the Measures to strengthen international cooperation in nuclear, radiation, transport and waste safety, the Application of Safeguards in the DPRK, the Application of IAEA Safeguards in the Middle East, and the Implementation of NPT Safeguards Agreement and relevant provisions of the Security Council Resolution on the Islamic Republic of Iran,

In relation to nuclear safety, several Members highlighted the importance of keeping up the momentum after the expiration of the IAEA Action Plan. The Director General also hoped that his report on the Fukushima Daiichi Accident "provide(s) a solid knowledge base for the future and ... help(s) to improve nuclear safety throughout the world."On matters related to nuclear security, the Director General underscored the importance of the Amendment to the Convention on the Physical Protection of Nuclear Material (CPPNM) and appealed to those countries that have not done so, to adhere to the Amendment.

The Board also discussed the application of safeguards in the DPRK, the application of IAEA safeguards in the Middle East, and the implementation of the NPT safeguards agreements in Iran and in Syria.

Concerning the <u>Application of Safeguards in</u> the <u>DPRK</u>, the Director General Yukiya Amano informed the Board of Governors on the IAEA's inability to verify the DPRK's nuclear program. The report highlights the recent mining and milling activities at the Yongbyon site.

On matters related to the *Implementation of* NPT Safeguards Agreement and relevant provisions of Security Council resolution on the Islamic Republic of Iran, the Board of Governors discussed the specific applications of safeguards in Iran. The Director General highlighted the importance of Iran's implementation of the Additional Protocol under the JCPOA, which will eventually provide credible assurance of the lack of undeclared nuclear materials and activities in Iran. The Director General informed the Board of Governors that Iran had provided, in August, a clarification of their past and present outstanding issues and indicated that the Agency will be submitting questions to Iran in September.

Concerning the discussions on the application of safeguards in the Middle East, the Director General Yukiya Amano indicated that he will continue to pursue his consultations, according to his mandate, which was reiterated in operative paragraph 10 of GC(58)/RES/16.

On 10 September, the Board of Governors endorsed the key reports for the 59th General Conference and approved the application for membership by Barbados and Antigua and Barbuda. The Chair of the Board of Governors for 2015-2016 is the Governor from Brazil, Ambassador Laercio Antonio Vinhas.

On 26 November, the Board of Governors met in Vienna, Austria. Directory General Yukiya Amano gave an introductory statement in which he detailed the advancements made over the course of the year in the fields of nuclear verification, nuclear safety and security, nuclear energy, nuclear applications, and technical

cooperation, as well as outlined some of the goals for the upcoming year.

**2014:** The Chair of the Board of Governors for 2013-2014 was the Governor from Viet Nam, Mr. Thiep Nguyen.

On 17 January, Director General Yukiya Amano submitted his report on <u>Monitoring</u> and <u>Verification in the Islamic Republic of Iran in Relation to the Joint Plan of Action</u> to the Board of Governors.

On 24 January, the Board of Governors convened a special meeting in Vienna to discuss the E3/EU+3 and Iran's request for the IAEA to monitor and verify nuclear associated actions covered in the *Joint Plan of Action*. Director General Yukiya Amano addressed the meeting and asked the Board of Governors to support the monitoring and verification activities that will be undertaken by the Agency as a result of the E3/EU+3 and Iran's request.

On 20 February, Director General Yukiya Amano submitted his report <u>Implementation</u> of the NPT Safeguards Agreement and relevant provisions of Security Council resolutions in the <u>Islamic Republic of Iran</u> to the Board of Governors.

On 3 March, the Board of Governors met in Vienna. Director General Yukiya Amano addressed the meeting and spoke about some of the most important issues on the IAEA's agenda, including the third anniversary of the accident at the Fukushima Daiichi Nuclear Power Plant, nuclear safety, energy, and applications, the implementation of safeguards in Iran and the DPRK, and the implementation of an NPT Safeguards Agreement in Syria, The Board of Governors was expected to discuss ways of

strengthening the IAEA's initiatives in the areas of nuclear, radiation, transport, and waste safety, nuclear science, technology, and applications, as well as nuclear verification. The Board would also review several reports, including the *Nuclear Safety Review 2014*, the implementation of the *IAEA Action Plan on Nuclear Safety, Nuclear Technology Review 2014*, and the implementation of safeguards in Iran, Syria, and the Democratic People's Republic of Korea.

On 2-4 June, the Board of Governors met in Vienna. The Board considered and subsequently recommended IAEA membership applications for Djibouti and Comoros. They also reviewed the *Safeguards Implementation Report for 2013*, leading to a discussion of implementation in areas including Iran, the DPRK, and Syria. Director General Yukiya Amano's <u>statement</u> to the Board included discussions of technical cooperation, peaceful applications of nuclear energy, and progress on nuclear safety and security treaties.

From 15 September through 19 September, the Board of Governors met for its third meeting of the year in Vienna. In addition to a statement from Director General Amano, topics discussed by the Board included: Strengthening the Agency's technical cooperation activities, and strengthening the Agency's activities related to nuclear, radiation, transport, and waste safety. Additionally, the reports on the Agency's nuclear science, technology, and applications were noted.

As for recent updates in the Agency's safeguards agreements, the Board discussed the application of safeguards in the DPRK, the application of IAEA safeguards in the

Middle East, and the implementation of the NPT safeguards agreements in the Islamic Republic of Iran and Syria.

On 20 November 2014, the IAEA Board of Governors began a two day meeting in Vienna. During the meeting, Director General Amano updated the Board on the IAEA's progress on providing assistance to countries affected by the Ebola Virus Disease. The Agency has supplied specialized diagnostic equipment to Sierra Leone and is working with other countries such as Côte d'Ivoire and Nigeria. Additionally, the Agency plans to launch a four-year regional project to help African countries to build a capacity to quickly and sensitively diagnose diseases that can be transmitted from animals to humans. Finally, the Agency published its latest report on Climate Change and Nuclear Power. The report noted that global demand for energy is likely to grow substantially over the coming decades, and the world's carbon footprint must be reduced. On 11 December, the Board of Governors met in Vienna. Director General Yukiya Amano delivered an introductory statement, requesting the Board to consider the extension of monitoring and verification activities in Iran. The Board endorsed the request.

**2013:** The Chair of the Board of Governors for 2012-2013 was Governor from Canada, Mr. John Barret.

On 21 February, the Director General submitted his report entitled <u>Implementation</u> of the NPT Safeguards Agreement and relevant provisions of Security Council resolutions in the Islamic Republic of Iran.

The report addressed a number of core issues related to Iran's nuclear program including enrichment and reprocessing activities, heavy water related projects, uranium conversion, design information and other outstanding issues.

The Director General reported that despite the passage of Resolution GOV/2012/50 and intensified dialogue between the IAEA and Iran since January 2012, efforts to resolve all outstanding issues have achieved no concrete results. The IAEA and Iran continue to work on developing a structured approach in order to clarify outstanding issues relating to possible military dimensions to Iran's nuclear program. Iran has not clarified outstanding issues, including those relating to the possible military dimensions to Iran's nuclear program.

The Director General's Report indicated that Iran, contrary to Board of Governors and Security Council Resolutions, has not suspended its enrichment activities and has produced 8271kg of UF6 enriched up to 5% and 280kg of UF6 enriched from 20%, up +660kg and +47kg, respectively, from the November 2012 report. Additionally, Iran has started the installation of more advanced centrifuges (IR-2m) at FEP. The IAEA has continued to push for information from Iran regarding the construction of ten uranium enrichment facilities, the sites for five of which, according to Iran, have been decided, and information in connection with its announcement on 7 February 2010 that it possessed laser enrichment technology.

Iran, contrary to Board of Governors and Security Council Resolutions, has not suspended work on its heavy water related projects, including the ongoing construction of the heavy water moderated research reactor at Arak and the IR-40 Research Reactor. Furthermore, Iran continues to

carry out uranium conversion and fuel fabrication and assembly activities. Since the last Director General's Report, Iran has begun using indigenously produced fuel assemblies, containing U-235 enriched up to 20%, in TRR.

Previous reports by the Director General have identified outstanding issues related to possible military dimensions to Iran's nuclear program. At Parchin, since the Director General's report in November 2012, the IAEA has observed: reinstatement of some of the chamber building's features (e.g. wall panels and exhaust piping); alterations to the roofs of the chamber building and the other large building; dismantlement and reconstruction of the annex to the other large building; construction of one small building at the same place where a building of similar size had previously been demolished; spreading, leveling and compacting of another layer of material over a large area; and installation of a fence that divides the location into two areas.

The Report noted that in the absence of the information that Iran had previously provided to the IAEA, including information pertaining to the Additional Protocol, the IAEA cannot provide credible assurance about the absence of undeclared nuclear material and activities.

From 4-7 March, the Board of Governors held <u>deliberations</u>. The Board discussed a number of issues, including: strengthening the Agency's activities related to nuclear, radiation, transport and waste safety; strengthening the Agency's activities related to nuclear science, technology and applications; nuclear verification; the conclusion of safeguards agreements and of

additional protocols; Application of Safeguards in the Democratic People's Republic of Korea; Implementation of the NPT Safeguards Agreement and Relevant Provisions of United Nations Security Council Resolutions in the Islamic Republic of Iran; and Implementation of the NPT Safeguards Agreement in the Syrian Arab Republic.

In addition to discussions, the Board reviewed a number of documents, including the <u>Nuclear Safety Review 2013</u>; Progress in the Implementation of the IAEA Action Plan on Nuclear Safety; and the <u>Nuclear Technology Review 2013</u>.

Additionally, on 6 March the Board of Governors re-appointed by acclamation the current Director General, Mr. Yukiya Amano, to a further term of office for four years, from 1 December 2013 to 30 November 2017.

From 3–7 June, the IAEA Board of Governors met in Vienna, Austria. The IAEA Director General Yukiya Amano opened the meeting with a <u>statement</u> that addressed technical cooperation, nuclear applications, nuclear safety and security, nuclear energy, assurance of supply, nuclear verification, implementation of safeguards, and the programme and budget.

During their deliberations, the Board discussed strengthening the Agency's activities related to technical cooperation; nuclear, radiation, transport and waste safety; and nuclear verification.

The Board approved the Addendum to the Safety Requirements on Safety of Nuclear Facilities and reviewed the IAEA Annual Report for 2012, the Technical Cooperation Report for 2012, the Safeguards

Implementation Report for 2012, and the Report of the Programme and Budget Committee. The Board took note of the IAEA Director General's report regarding the implementation of Iran's NPT Safeguards Agreement. The Board further approved the designation of members to serve on the Board in 2013-2014.

From 9-13 September, the 35-member IAEA Board of Governors meeting took place in Vienna. The meeting commenced with an introductory statement by IAEA Director General Yukiya Amano. The Director General began the Board meeting with reports on two IAEA conferences that took place before the current session of the Board of Governors. Director General Amano also informed the group that the IAEA had received a request for membership of the Agency from the Commonwealth of the Bahamas.

Continued progress is still being made in regards to the work on the comprehensive Agency report on the Fukushima Daiichi accident. This will be finalized at the end of 2014. The DG reported on its 2013 Nuclear Security Report, where it showed significant increase in the delivery of training courses of capacity-building to help States establish effective and sustainable national nuclear security regimes. According to the current data, ten states have joined the Agency's Incident and Trafficking database.

According to current data, there is also an increased growth in global use of nuclear power by 2030. The Director-General also distributed his latest report on the establishment of the IAEA LEU Bank in Kazakhstan.

In regards to nuclear verification, especially the Additional Protocol, Bosnia and Herzegovina brought an additional protocol into force. Furthermore, Kuwait amended its small quantities protocol. Guinea-Bissau signed a comprehensive safeguards agreement, a small quantities protocol, and an additional protocol. Saint Kitts and Nevis, Antigua and Barbuda and the Republic of the Union of Myanmar also submitted drafts for the additional protocol.

The Director General also announced that he had received a letter from the Russian Federation asking the IAE to conduct an analysis of risks associated with possible military strikes on the Miniature Neutron Source Reactor and other sites in Syria.

During the 5-day meeting, the Board discussed a number of issues such as measures to strengthen international cooperation in nuclear, radiation, transport and waste safety, Furthermore, the Board received an update on the implementation of the IAEA Action Plan on Nuclear Safety, reviewed the Nuclear Security Report of 2013, and considered the Nuclear Security Plan for 2014-2017.

On 12 September, the Director General submitted his report on the *Implementation of the NPT Safeguards Agreement and relevant provisions of Security Council resolutions in the Islamic Republic of Iran.* 

The report details letters and reports Iran has given to the IAEA. In contrast to the resolutions set by the Board of Governors and the Security Council, Iran has not suspended its enrichment-related activities. In a letter dated 25 August 2013, Iran informed the IAEA that "based on the practical progress of construction work" the previously indicated "start-up" date for the IR-40 Reactor was "not achievable"

The report details two of Iran's declared facilities, Natanz and Fordow Fuel Enrichment Plant. As for other enrichment related activities, the IAEA has been unable to verify them due to the lack of cooperation from Iran. Iran has also continued its heavy water related projects. Since the Director General's previous report, Iran has started to produce fuel assemblies containing nuclear material for the IR-40 Reactor.

The Director General's Report indicated that Iran, contrary to Board of Governors and Security Council Resolutions, has not suspended its enrichment activities and has produced 9704kg of UF6 enriched up to 5% and 372.5kg of UF6 enriched from 20%, up 744kg and 48.5kg, respectively, from the May 2013 report. The IAEA has continued to push for information from Iran regarding the construction of ten uranium enrichment facilities. Furthermore, the IAEA reiterated its request that Iran provide early access to a specified location within the Parchin site.

On 14 November, Director General Yukiya Amano submitted his report on the *Implementation of the NPT Safeguards*Agreement and relevant provisions of Security Council resolutions in the Islamic Republic of Iran.

On 28 November, the Board of Governors convened their last regular meeting of the year in Vienna. Director General Yukiya Amano <u>addressed</u> the meeting and, among other topics, commented on the recently-concluded Technical Assistance and Cooperation Committee meeting. Amano praised the Technical Cooperation programme for its work over the course of more than 50 years.

The Board of Governors <u>discussed</u> several Agency reports, including: *Technical* 

Cooperation: Report of the Technical Assistance and Cooperation Committee, IAEA Action Plan on Nuclear Safety, Implementation of the NPT Safeguard Agreements and Relevant Provisions of the United Nations Security Council Resolutions in the Islamic Republic of Iran, and the Third Amendment to the Agreement for Cooperation between the Agency and the United States of America.

<u>Deliberations were also expected</u> on nuclear verification, the use of Department of Safeguards' staff as Agency inspectors, and the application of safeguards in Syria and the Democratic People's Republic of Korea.

2012: The Chair of the Board of Governors for 2011-2012 is the Governor from Italy, Mr. Gianni Ghisi. He succeeds Mr. Ansar Parvez, Governor from Pakistan. The Ambassadors and Resident Representatives of the Czech Republic and Jordan were elected as Vice-Chairmen. They are Ms. Dana Drábová, Governor from the Czech Republic, and Mr. Makram Mustafa Queisi, Governor from Jordan.

On 24 February, the Director General submitted his report entitled *Implementation* of the NPT Safeguards Agreement and relevant provisions of Security Council resolutions in the Islamic Republic of Iran.

The report details a series of talks between the IAEA and Iran intended to clarify unresolved issues. The report notes that the IAEA "continues to have serious concerns regarding possible military dimensions to Iran's nuclear programme," and concludes that while the IAEA continues to verify the non-diversion of declared nuclear material under Iran's Safeguards Agreement, the IAEA "is unable to provide credible assurance about the absence of undeclared

nuclear material and activities in Iran," as Iran is not providing the necessary cooperation.

From 5-8 March, the Board of Governors held <u>deliberations</u>. The Board discussed the Agency's activities regarding nuclear verification; nuclear safety, including the 2012 Nuclear Safety Review and implementation of the <u>IAEA Action Plan on Nuclear Safety</u>; and, its activities regarding nuclear science, technology and applications, including the 2012 Nuclear Technology Review. The Board also discussed the implementation of safeguards and relevant UN Security Council Resolutions in the <u>Democratic People's Republic of Korea</u>, the <u>Islamic Republic of Iran</u>, and the <u>Syrian Arab Republic</u>.

On 25 May, the Director General submitted his report on the Implementation of the NPT Safeguards Agreement and relevant provisions of Security Council resolutions in the Islamic Republic of Iran. Most significantly, the report details progress on developing a structured approach between the IAEA and Iran in relation to the clarification of issues relating to possible military dimensions to Iran's nuclear program. Prior to the release of the report, in a letter dated 2 May 2012, the IAEA informed Iran that based on satellite imagery at the Parchin site, where virtually no activity had been observed for a number of years, the buildings of interest to the IAEA are now subject to extensive construction activities that can hamper the Agency's ability to undertake verification. The IAEA reiterated its request that Iran provide early access to a specified location within the Parchin site.

The Director General's report indicated that Iran has not suspended its enrichment activities and has not yet provided information in response in relation to announcements made by Iran concerning the construction of ten new uranium enrichment facilities, the sites for five of which. according to Iran, have been decided and information in connection with its announcement on 7 February 2010 that it possessed laser enrichment technology. Iran continues to increase its enrichment capacity and has declared its intent to install three new types of centrifuges IR-5, IR-6 and IR-6s. Iran has also continued its heavy water related projects, including the construction of its IR-40 reactor, and continues to restrict access to the Heavy Water Production Plant (HWPP).

The IAEA also reported that it remains unable to make further progress in verifying the scope and nature of the Iranian program. Despite this, the report stated that the IAEA has been able to verify that there are no reprocessing related activities going on in Iran.

On June 4 the Board of Governors began their second meeting of the year, opening with a statement by Director General Yukiya Amano. The meeting concluded on 6 June after discussing the implementation of the IAEA Action Plan on Nuclear Safety in North Korea; Implementation of the NPT Safeguards Agreement and Relevant Provisions of Security Council Resolutions in the Islamic Republic of Iran; Implementation of the NPT Safeguards Agreement in the Syrian Arab Republic; the Safeguards Implementation Report for 2011; the Annual Report for 2011 and the Technical Cooperation Report for 2011.

The Board also elected a new Chairman, Mr. Filippo Formica, for the remainder of the 2011-2012 term. He succeeds the Governor of Italy, Mr. Gianni Ghisi. The Board reviewed the IAEA applications of Fiji and San Marino and recommended their membership to the General Conference.

On 30 August, the Director General submitted three reports to the Board of Governors: 1) <u>Application of Safeguards in the Democratic People's Republic of Korea</u>, 2) <u>Implementation of the NPT Safeguards Agreement in the Syrian Arab Republic</u>, and 3) <u>Implementation of the NPT Safeguards Agreement and relevant provisions of Security Council resolutions in the Islamic Republic of Iran</u>.

The **DPRK** report highlighted the recent developments in the DPRK including an invitation, which was later rescinded, for the IAEA to visit the DPRK to "discuss technical issues with regard to the monitoring of [a] moratorium on uranium enrichment activities at Nyongbyon in accordance with the agreement of the DPRK-US high-level Talks held in Beijing..." The report went on to underline that, although the IAEA has not been able in implement safeguards in the DPRK and, therefore, cannot draw any safeguards conclusions, it continues to monitor developments at the Yongbyon site, the 2006 and 2009 nuclear test locations, and construction of the LWR. The IAEA has not been able to assess the design features or likely completion date of the LWR.

The **Syria** report highlighted that since the Director General's report of 24 May 2011, the IAEA has not received any new information on the Dair Alzour site and thus has not changed its assessment of the nature

of building destroyed. Additionally, the IAEA cannot provide any assessment concerning the nature or operational status of the three related buildings.

The **Iran** report addressed a number of core issues related to Iran's nuclear program including enrichment and reprocessing activities, heavy water related projects, uranium conversion, design information and other outstanding issues.

The Director General reported that despite intensified dialogue between the IAEA and Iran since January 2012, efforts to resolve all outstanding issues have achieved no concrete results. The IAEA and Iran continue to work on developing a structured approach in order to clarify outstanding issues relating to possible military dimensions to Iran's nuclear program. Iran has not responded to the IAEA's questions on Parchin and the foreign expert; Iran has not provided the IAEA with access to the location within the Parchin; and Iran has been conducting activities at that location that will significantly hamper the IAEA's ability to conduct effective verification.

The Director General's Report indicated that Iran, contrary to Board of Governors and Security Council Resolutions, has not suspended its enrichment activities and has produced 6876kg of UF6 enriched up to 5% and 189.4kg of UF6 enriched from 20%, up 679kg and 43.8kg, respectively, from the May 2012 report. The IAEA has continued to push for information from Iran regarding the construction of ten uranium enrichment facilities, the sites for five of which, according to Iran, have been decided, and information in connection with its announcement on 7 February 2010 that it possessed laser enrichment technology.

Iran, contrary to Board of Governors and Security Council Resolutions, has not suspended work on its heavy water related projects and continues to carry out uranium conversion, as well as, fuel fabrication and assembly activities. Since the last Director General's Report, Iran has begun using indigenously produced fuel assemblies, containing U-235 enriched up to 20%, in TRR.

The Report noted that in the absence of the information that Iran had previously provided to the IAEA, including information pertaining to the Additional Protocol, the IAEA cannot provide credible assurance about the absence of undeclared nuclear material and activities.

During the 56th IAEA General Conference, eleven countries were elected to serve on the Board of Governors for the period 2012-2014. The newly elected Board members are Algeria, Argentina, Costa Rica, Greece, Libya, Nigeria, Norway, Pakistan, Poland, Thailand and Uruguay.

On 25 September, the Board of Governors concluded its third meeting of the year. Following an opened statement by Director General Yukiya Amano, the Board discussed several key issues, including the implementation of safeguards in Syria and the Democratic People's Republic of Korea, application of IAEA safeguards in the Middle East and the Director General's report on the Implementation of the IAEA Action Plan on Nuclear Safety, as well as approving a *Nuclear Security Fundamentals*, the foundation document of the Nuclear Security Series.

In addition, the Board adopted a <u>Resolution</u> <u>GOV/2012/50</u> urging Iran to "comply fully and without delay with all of its obligations

under the relevant Resolutions of the UN Security Council, and to meet the requirements of the Board of Governors, including the application of the modified Code 3.1 and the implementation and prompt entry into force of the Additional Protocol." The Resolution "requests the Director General to include in his progress report at the November 2012 Board of Governors a comprehensive report on substantive implementation of the 18 November 2011 Resolution (GOV/2011/69) and this resolution, especially with respect to the possible military dimensions of Iran's nuclear program."

On 16 November, the Director General submitted a report to the Board of Governors entitled, Implementation of the NPT Safeguards Agreement and relevant provisions of Security Council resolutions in the Islamic republic of Iran. The report addressed a number of core issues related to Iran's nuclear program including enrichment and reprocessing activities, heavy water related projects, uranium conversion, design information and their outstanding issues. In particular, in line with the request of the Board of Governors in resolution GOV/2012/50 (13 September 2012), the Report provides a comprehensive report on substantive implementation of that resolution and of resolution GOV/2011/69 (18 November 2011), especially with respect to the possible military dimensions of Iran's nuclear program.

**2011:** The Chair of the Board of Governors for 2010-2011 was the Governor from Pakistan, Mr. Ansar Parvez.

On 25 February, Director General Yukiya Amano submitted two reports to the Board of Governors: 1) *Implementation of the NPT* 

Safeguards Agreement and Relevant
Provisions of Security Council Resolutions
in the Islamic Republic of Iran\_and 2)\_
Implementation of the NPT Safeguards
Agreement in the Syrian Arab Republic.

The report on **Iran** details its recent nuclear activities, in particular ongoing enrichment efforts and IAEA verification efforts. Contrary to both the Board of Governors and United Nations Security Council (UNSC) resolutions, Iran continues to produce low enriched uranium at the Fuel Enrichment Plant (FEP) and the Pilot Fuel Enrichment Plant (PFEP) in Natanz. Since 18 October 2010 the FEP has produced 471kg of UF6, bringing the total production amount to 3,606 kg. The PFEP has produced 25.1 kg of UF6 enriched up to 20% as of September 2010.

The Director General noted the future of Iran's nuclear program remains uncertain. Iran has not provided further information regarding the Fardow Fuel Enrichment Plant outside of Qom nor its plans to develop 10 more enrichment facilities. Iran has also not provided clarification on its laser enrichment technology or third generation centrifuges. As a result, the Agency's knowledge of Iran's enrichment activities continues to diminish. The Agency has been able to verify that Iran is not engaged in reprocessing activities only at the Tehran Research Reactor (TRR) and the Molybdenum, Iodine and Xenon Radioisotope Production Facility (MIX). Iran has not suspended work on heavy water related projects, including the construction of the IR-40 heavy water moderated reactor, currently under Agency safeguards. It is planned to become operational by 2013. Iran objected to Agency requests for further access to the Heavy Water Production Plant,

claiming that such requests go beyond its Safeguard Agreement.

The Agency restated its concerns about the possible existence of past or current undisclosed nuclear related activities of a military nature in Iran. Its requests for further information from Iran have not been met satisfactorily, if at all. Finally, the Director General reported that Iran is not implementing Additional Protocol, further contributing to international concern over its nuclear program.

The report on Syria highlights questions regarding the Dair Alzour site. Syria continues to maintain that the building was a "non-nuclear military installation." Such claims are inconsistent with Agency information and Syrian Atomic Energy Commission activities, creating uncertainty regarding the facilities and Syria's activities there. The IAEA has not received satisfactory explanations for the origins and presence of anthropogenic natural uranium found at the site. Since 2008, the Agency has repeatedly requested further cooperation from Syria regarding the Dair Alzour site; however, Syria maintains that such requests go beyond its Safeguards Agreement.

The Agency is also concerned about unidentified anthropogenic uranium particles found in 2009 in the Miniature Neutron Source Reactor (MNSR). Syria's declarations are inconsistent with Agency findings that remain unresolved. The Director General urged Syria to bring into force an Additional Protocol and to expediently resolve outstanding questions regarding its nuclear activities.

On 7 - 11 March, the Board Convened its first scheduled session of the meetings of the year. On 7 March the Director General

addressed the opening session of the Board of Governors. In his statements, Director General Yukiya Amano reminded the body of the 25<sup>th</sup> anniversary of the Chernobyl nuclear disaster and the need to strengthen nuclear safety. He also discussed future application of nuclear technology to water purification efforts and expressed some of the ongoing concerns with the nuclear programs of the DPRK, Iran, and Syria.

On 21 March the Board convened a special session with the Director General to discuss the ongoing nuclear emergency at the Fukushima Nuclear Reactors in Japan.

On 24 May, Director General Yukiya Amano submitted two reports to the Board of Governors:

1) Implementation of the NPT Safeguards
Agreement and Relevant Provisions of
Security Council Resolutions in the Islamic
Republic of Iran and 2) Implementation of
the NPT Safeguards Agreement in the Syrian
Arab Republic.

The report on **Iran** details its recent nuclear activities, in particular ongoing enrichment efforts and IAEA verification efforts. Iran has declared to the Agency 16 nuclear facilities and nine locations outside facilities where nuclear material is customarily used (LOFs), all of which are situated within hospitals. Contrary to both the Board of Governors and United Nations Security Council (UNSC) resolutions, Iran has not fully implemented the Additional Protocol, and continues to produce low enriched uranium at the Fuel Enrichment Plant (FEP) and the Pilot Fuel Enrichment Plant (PFEP) in Natanz. On 14 May 2011, 53 cascades were installed in three of the eight units in Production Hall A, 35 of which were being fed with UF6. Iran has modified 12 of the

cascades to contain 174 centrifuges each, all of which are IR-1 machines. As of 14 May 2011, installation work in the remaining five units was ongoing, but no centrifuges had been installed. There had been no installation work in Production Hall B. Iran has estimated that, between 18 October 2010 and 13 May 2011, it produced an additional 970 kg of low enriched UF6, which would result in a total production of 4105 kg of low enriched UF6 since February 2007. At PFEP, Iran has estimated that, between 19 September 2010 and 21 May 2011, a total of 222.1 kg of UF6 enriched at FEP was fed into the two interconnected cascades and that approximately 31.6 kg of UF6 enriched up to 20% U-235 was produced. This would result in a total of approximately 56.7 kg of UF6 enriched up to 20% U-235 having been produced since the process began in February 2010. While the Agency continues to verify that FFEP is being constructed according to the latest Design Information Questionnaire (DIQ) it is still not in a position to confirm the chronology of the design and construction of FFEP or its original purpose. Iran has stated that there is no legal basis upon which the Agency may request information on the chronology and purpose of FFEP. As of 21 May 2011, no centrifuges had been introduced into FFEP. The results of the analysis of the environmental samples taken at FFEP up to February 2010 did not indicate the presence of enriched uranium.

Iran has not provided the Agency with information related to the announcements made by Iran concerning the construction of ten new uranium enrichment facilities, the sites for five of which, according to Iran, have been decided. In a letter dated 26 April 2011, the Agency requested design and scheduling information regarding decisions

to construct new nuclear facilities, to which Iran, on 3 May 2011, stated that it would provide the Agency with the required information in "due time" and in accordance with its Safeguards Agreement. The Agency has no information as to whether that construction has started. Iran has not provided information to the Agency in connection with its announcement on 7 February 2010 that it possessed laser enrichment technology, and its announcement on 9 April 2010 regarding the development of third generation centrifuges.

On 8 May 2011, the Agency carried out an inspection and design information verification (DIV) at the Tehran Research Reactor (TRR), and a DIV at the Molybdenum, Iodine and Xenon Radioisotope Production Facility MIX Facility on 9 May 2011. The Agency has been able to verify that Iran is not engaged in reprocessing activities at the (TRR) and (MIX), but cannot verify other sites that Agency does not have access to.

Iran has not suspended work on heavy water related projects, including the construction of the IR-40 heavy water moderated reactor, currently under Agency safeguards. On 10 May 2011, the Agency carried out a DIV at the IR-40 Reactor at Arak and observed that construction of the facility was ongoing and that the moderator heat exchangers had been delivered to the site. According to Iran, the operation of the IR-40 Reactor is planned to commence by the end of 2013. The following day, on 11 May 2011, the Agency carried out an inspection and a DIV at the Fuel Manufacturing Plant (FMP) at Esfahan and confirmed that Iran had not yet started to install equipment for TRR fuel fabrication. The Agency, and Security Council, have requested that Iran make the

necessary arrangements to provide the Agency, at the earliest possible date, with access to the Heavy Water Production Plant (HWPP), the heavy water stored at the Uranium Conversion Facility (UCF), and any other location in Iran where projects related to heavy water are being carried out, in order to take samples

Although the Agency, since the last report of the Director General on 25 February 2011, has received further information related to possible undisclosed nuclear related activities, the Agency remains concerned about the possible existence in Iran of past or current undisclosed nuclear related activities involving military related organizations, including activities related to the development of a nuclear payload for a missile. There are seven particular areas of concern: Neutron generator and associated diagnostics; Uranium conversion and metallurgy; High explosives manufacture and testing; Exploding bridgewire (EBW) detonator studies, particularly involving applications necessitating high simultaneity; Multipoint explosive initiation and hemispherical detonation studies involving highly instrumented experiments; High voltage firing equipment and instrumentation for explosives testing over long distances and possibly underground; Missile re-entry vehicle redesign activities for a new payload assessed as being nuclear in nature

Following a physical inventory verification (PIV) at the Bushehr Nuclear Power Plant (BNPP), on 15–16 April 2011, the Agency verified all nuclear material present and confirmed that the loading of the fuel assemblies into the core had been completed. On 10 May 2011, Iran informed

the Agency that the reactor had reached criticality.

The report on **Syria** highlights questions regarding the Dair Alzour site and three other locations that were functionally related to it. Syria continues to maintain that the building at Dair Alzour was a "non-nuclear military installation." Such claims are inconsistent with Agency information and Syrian Atomic Energy Commission activities, creating uncertainty regarding the facilities and Syria's activities there. The IAEA has not received satisfactory explanations for the origins and presence of anthropogenic natural uranium found at the site. The IAEA is unable to provide assessment concerning the nature of the three related buildings or their operational status. Since 2008, the IAEA has requested further cooperation from Syria regarding the Dair Alzour site and the three related locations; however, Syria maintains that such requests go beyond its Safeguards Agreement.

From 6 – 10 June, the Board convened its third scheduled session of meetings of the year. On 6 June, IAEA Director General Yukiya Amano opened the session with a statement addressing several issues, including the Fukushima Daiichi accident in Japan and several safeguards agreements and additional protocols. In particular, Amano addressed how the IAEA has been unable to implement any safeguard measures in the DPRK, as well as limited measures in Iran and Syria.

On 9 June, the Board of Governors passed Resolution (GOV/2011/41). The Resolution that Syria had not complied with its obligations under its Safeguards Agreements with the IAEA by failing to declare the

construction of a nuclear reactor at Dair Alzour. The Board voted and <u>reported</u> Syria to the UNSC for its non-compliance.

On 2 September, Director General Yukiya Amano submitted two reports to the Board of Governors: 1) *Implementation of the NPT Safeguards Agreement and relevant provisions of Security Council resolutions in the Islamic Republic of Iran* and 2) *Application of Safeguards in the Democratic People's Republic of Korea.* 

The report on Iran details its recent nuclear activities, in particular ongoing enrichment efforts and IAEA verification efforts. Contrary to both the Board of Governors and United Nations Security Council (UNSC) resolutions, Iran continues to produce low enriched uranium at the Fuel Enrichment Plant (FEP) and the Pilot Fuel Enrichment Plant (PFEP) in Natanz. Between 18 October 2010 and 13 August 2011, the FEP has produced 1408kg of UF6, bringing the total production amount to 4,543 kg. Between 19 September 2010 and 20 August 2011, the PFEP has produced 45.7 kg of UF6 enriched up to 20%, bringing total production since February 2010 to

70.8 kg. Furthermore, on 9 June 2011, the day after the IAEA Director General Issued his June report, the IAEA received a letter from Iran in which Iran disclosed its decision to produce UF6 enriched up to 20% U-235 in two interconnected cascades (each of which consists of 173 centrifuges) at the Fordow Fuel Enrichment Plant (FFEP), not 5% as reported earlier. As of

20 August 2011, 13 days after Iran and the Agency agreed on a safeguards approach for FFEP, Iran had installed one of the centrifuge cascades. Although the nature of

Iran's other enrichment activities remains unclear, on 18 August 2011, in response to IAEA requests, Iran provided the Agency access to an installation where R&D on advanced centrifuges was taking place. During the Agency's visit, Iran provided extensive information on its current and future R&D work on advanced centrifuges.

On 17 August 2011, the Agency carried out a PIV and a design information verification (DIV) at the Tehran Research Reactor (TRR), and a DIV at the Molybdenum, Iodine and Xenon Radioisotope Production Facility MIX Facility, and has been able to verify that Iran is not engaged in reprocessing activities at the (TRR) and (MIX), but cannot verify other sites that Agency does not have access to.

Iran has not suspended work on heavy water related projects, including the construction of the IR-40 heavy water moderated reactor, currently under Agency safeguards. It is planned to become operational by 2013. During its first visit to the Heavy Water Production Plant (HWPP) since 2005, the Agency observed that the HWPP was operating, and was informed by Iran that it had produced approximately 60 tons of heavy water at HWPP. Iran objected to Agency requests for access to heavy water stored at the Uranium Conversion Facility (UCF).

On 27 August, the Agency carried out inspections and DIVs at UCF, during which Iran declared that it had fed 652.2kg of uranium in the form of UOC and produced 96kg of uranium in the form of UO2. Furthermore, the Agency, following inspection on 10 August 2011, has confirmed that Iran has not yet started to

install equipment for fuel fabrication for TRR.

The Report also notes Iran's failure to implement the Additional Protocol and other obligations contained in relevant resolutions of the Board of Governors and the UN Security Council, including the modified Code 3.1 of the Subsidiary Arrangements General Part to its Safeguards Agreement; suspended enrichment related activities; suspended heavy water related activities; and addressed the Agency's concerns about possible military dimensions to Iran's nuclear.

The report on the **DPRK** gives a detailed history of the nuclear activities in the DPRK, in particular ongoing enrichment efforts, light water reactor construction, reprocessing activities, weaponization activities and IAEA verification efforts. The Report highlighted that since December 2002 the IAEA has not been able to implement safeguards in the DPRK and, therefore, cannot draw any safeguards conclusions. Additionally, since the secession of the ad hoc monitoring and verification arrangement in the DPRK in April 2009, the IAEA has been unable to monitor or verify nuclear activities within the DPRK and therefore cannot provide any conclusions concerning the DPRK's nuclear activities.

From 12 – 16 September, the 35-nation IAEA Board of Governors convened for their third scheduled session of the year, which immediately precedes the annual General Conference to be held from 19-23 September 2011. On 12 September the Board heard an introductory statement from Director General Yukiya Amano, including an update on the Fukushima Daiichi

accident in Japan, nuclear security, nuclear verification, safeguards, assurance of fuel supply and budget-related issues. In particular, the Director General addressed questions relating to the implementation of safeguards in the DPRK, Iran and Syria, and gave an update to matters relating to the Enhancing Capabilities of the Safeguards Analytical Services (ECAS) Project and Women in the IAEA Secretariat

During the 5-day meeting, the Board discussed: strengthening international cooperation in nuclear, radiation, transport and waste safety; nuclear security, including measures to protect against nuclear and radiological terrorism, as well as the annually issued Nuclear Security Report; strengthening the IAEA's activities related to nuclear science, technology and applications; and nuclear verification, including, applying Safeguards in the Democratic People's Republic of Korea; implementing the NPT Safeguards Agreement and Relevant Provisions of Security Council Resolutions in the Islamic Republic of Iran; as well as Implementing the NPT Safeguards Agreement in the Syrian Arab Republic

On 15 September, the Board concluded its five- day meeting. The Board approved a *Draft* IAEA Action Plan on Nuclear Safety, to be considered during the IAEA General Conference. In addition, the Board approved a *revised* IAEA Safety Standards on the Safety of Nuclear Power Plants: Design (Safety Standards Series No. NS- R-1), as well as a *revision* of IAEA Safety Series No. 115 *Radiation Protection and Safety of Radiation Sources: International Basic Safety Standards*.

On 26 September the IAEA Board of Governors met, in a one-day session, to address issues that arose from the 55<sup>th</sup> regular session of the *General Conference*, which was held in Vienna on 19-23 September, and to elect a Chairman as well as a Vice-Chairmen to the Board of Governors from the period of 2011-2012

In his opening address, Director General Yukiya Amano announced the establishment of a Nuclear Safety Action Team tasked with overseeing the implementation of the *IAEA Action Plan on Nuclear Safety*, which was endorsed by the *General Conference*. Furthermore, the Director General also updated the Board on the IAEA's plans to further assist Japan in the wake of the March nuclear accident

The IAEA Board elected the Governor for Italy, Mr. Gianni Ghisi, and the Governors for the Czech Republic, Ms. Dana Drábová, and for Jordan, Mr. Makram Mustafa Queisi as the Board Chairman and the Vice-Chairmen, respectively.

During the 55th IAEA General Conference in Vienna, Member States elected 13 countries to serve on the 35-member IAEA Board of Governors for a one-year period from 2011- 2012. The newly elected Board members are: Argentina, Australia, Canada, China, France, Germany, India, Japan, Netherlands, Russian Federation, South Africa, United Kingdom of Great Britain and Northern Ireland and the United States of America. Other members of the Board of Govenors include: Belgium, Brazil, Bulagaria, Chile, Cuba, Czech Republic, Ecuador, Egypt, Hungary, Indonesia, Italy, Jordan, Republic of Korea, Mexico, Niger, Portugal, Saudi Arabia, Singapore, Sweden, Tunisia, United Arab Emirates, and the United Republic of Tanzania.

On 08 November, Director General Yukiya Amano submitted a report to the Board of Governors: *Implementation of the NPT Safeguards Agreement and relevant provisions of Security Council resolutions in the Islamic Republic of Iran.* 

The report on **Iran** details its recent nuclear activities, in particular ongoing enrichment efforts and IAEA verification efforts. Contrary to both the Board of Governors and United Nations Security Council (UNSC) resolutions, Iran continues to produce low enriched uranium at the Fuel Enrichment Plant (FEP) and the Pilot Fuel Enrichment Plant (PFEP) in Natanz, as well as the Fordow Fuel Enrichment Plant (FFEP), near the city of Oom. As of 2 November 2011, 54 cascades were installed in three of the eight units in Production Hall A, 37 of which were declared by Iran as being fed with UF6. To date, all the centrifuges installed are IR-1 machines. Iran has estimated that, between 18 October 2010 and 1 November 2011, it produced 1787 kg of low enriched UF6, which would result in a total production of 4922 kg of low enriched UF6 since production began in February 2007. The Agency conducted a physical inventory verification (PIV) at FEP between 15 October and 8 November 2011, the results of which the Agency is evaluating. Following analysis, the Agency has concluded that the facility has operated as declared by Iran in the Design Information Questionnaire (DIQ).

Following a PIV at PFEP, conducted between 13 and 29 September 2011, the Agency verified that, as of 13 September 2011, 720.8 kg of low enriched UF6 had

been fed into the cascade(s) in the production area since the process of feeding low enriched UF6 into the cascade(s) began on 9 February 2010, a total of 73.7 kg of UF6, enriched up to 20% U-235 had been produced. Iran has estimated that, between 14 September 2011 and 28 October 2011, a total of 44.7 kg of UF6 enriched at FEP was fed into the two interconnected cascades and that approximately 6 kg of UF6 enriched up to 20% U-235 were produced. The Agency continues to verify Iranian estimates. The Agency has verified that Iran had installed 164 IR-2m centrifuges in Cascade 5, all of which were under vacuum, and 66 IR-4 centrifuges in Cascade 4, none of which had been fed with UF6. Between 21 August 2011 and 28 October 2011, a total of approximately 59.8 kg of natural UF6 was fed into centrifuges in the R&D area, but no LEU was withdrawn as the product and the tails are recombined at the end of the process. Following analysis, the Agency has concluded that the facility has operated as declared by Iran in the DIO. Following the revised DIQ for the FFEP, released in June 2011, Iran was reported to have decided to triple its production capacity, after which Iran would no longer use the 20% fuel production at PFEP at Natanz

### 2010:

The Chair of the Board of Governors for 2009- 2010 was the Ambassador and Resident Representative of Malaysia, Mr. M. H. Arshad. On 18 February, the new Director General Yukiya Amano submitted two reports to the Board of Governors: 1)

Implementation of the NPT Safeguards
Agreement and relevant provisions of Security Council resolutions 1737 (2006), 1747 (2007), 1803 (2008) and 1835

# (2008) in the Islamic Republic of Iran and 2) Implementation of the NPT Safeguards in the Syrian Arab Republic.

The report on **Iran** details Iran's continued enrichment activities and plans to enrich material up to 20% U-235 at Natanz. The results of Physical Inventory Verification (PIV) at the Fuel Enrichment Plant (FEP) at Natanz and Iran's estimates indicate that 2065kg of low enriched UF6 has been produced as of 29 January 2010, with environmental samples verifying the level of enrichment to be 3.47% U-235. Nuclear material, installed cascades, and feed and withdrawal stations at FEP continue to be subject to IAEA containment and surveillance.

Iran submitted a revised version of the Design Information Questionnaire (DIQ) for the Pilot Fuel Enrichment Plant (PFEP) at Natanz that provides for the production of UF6 enriched to up to 20%. On 8 February, Iran informed the Agency it intended to transfer low enriched UF6 produced at the FEP to the feed station of PFEP on 9 February, and requested the Agency be present at the site. The Agency requested that no low enriched UF6 be fed into the PFEP for enrichment to 20% until proper additional safeguards were in place under Article 45 of the Safeguards Agreement. According to the report, in spite of the Agency's request, by 10 February Iran had started feeding low enriched UF6 into one cascade at PFEP. On 14 February, with Agency inspectors present, Iran moved 1950kg of low enriched UF6 from FEP to the PFEP feed station, which the inspectors then sealed. Iran provided the Agency with mass spectrometry results indicating that "enrichment levels of up to 19.8% U-235

were obtained at PFEP between 9 and 11 February 2010." Material and equipment at PFEP remain under the IAEA containment and surveillance, but the Agency also requested a meeting to discuss a revised safeguards approach in light of new enrichment levels.

The report also notes Iran's failure to implement the Additional Protocol and other requirements contained in relevant resolutions of the Board of Governors and the UN Security Council. Iran's failure to provide information and access to activities involving precision detonators, studies on the initiation of high explosives, missile reentry body engineering, a project for the conversion of UO2 to UF4 and various procurement related activities have raised concerns "about the possible existence in Iran of past or current undisclosed activities related to

the development of a nuclear payload for a missile." The Director General calls on Iran to fully cooperate with the Agency, clarify outstanding issues giving rise to concerns about a possible military dimension to Iran's nuclear program, provide design information for all relevant facilities and to take steps towards implementing the Additional Protocol.

The report on **Syria** highlighted that since 2008, Syria has declined to have substantive discussions with the Agency about the Dair Alzour site, has not provided detailed information requested by the Agency and has not granted the Agency further access to the site or to three surrounding facilities of interest. The report also emphasized that Syria's previous explanation of the origin of anthropogenic natural uranium particles found at the Miniature Neutron Source

Reactor (MNSR) were not supported by the Agency's analysis of samples, and a possible link to the particles found at the Dair Alzour site required further examination.

Syria has offered another explanation for the origin of particles at MNSR, suggesting they originated from other materials present at the site, such as yellowcake and uranyl. The report noted that environmental samples taken in November 2009 "confirmed the characteristics of the material as declared by Syria, "but the Agency required further clarification regarding the presence and use of anthropogenic natural uranium at the MNSR. In addition, it was reported that Syria has not provided design information concerning irradiation of uranium at the MNSR or met its nuclear material reporting obligations under the Safeguards Agreement

On March 1, in his <u>introductory statement</u> to the Board, the Director General addressed various issues, including nuclear energy, Iran's request for obtaining fuel for the Tehran Research Reactor, nuclear safety and security, cancer control, and nuclear verification including the application of safeguards in the Democratic People's Republic of Korea, implementation of safeguards in the Islamic Republic of Iran and implementation of safeguards in the Syrian Arab Republic.

On 31 May, the Director General submitted two reports to the Board of Governors:

1) Implementation of the NPT Safeguards
Agreement and relevant provisions of
Security Council resolutions 1737 (2006),
1747 (2007), 1803 (2008) and 1835 (2008)
in the Islamic Republic of Iran and 2)
Implementation of the NPT Safeguards
Agreement in the Syrian Arab Republic.

The **Iran** report indicates that since the last PIV at FEP, conducted on 22 November 2009, Iran produced an additional 619kg of low enriched UF6, which puts total current production at 2427kg. As of March 2010, environmental samples confirmed that the maximum enrichment level of 5% had not been exceeded. At the Pilot Fuel Enrichment Plant (PFEP) in Natanz, Iran installed all centrifuges for a second 164-machine IR-1 cascade to connect to Cascade 1, but as of 25 May Iran had neither started to feed the cascade, nor connected it to the first cascade.

According to the report, the IAEA and Iran agreed on a revised safeguards approach to account for the enrichment levels of up to 20% U-235 and the installation of another cascade. New measures include two unannounced inspections per month, monthly DIV and interim inventory verification, application of additional seals, and other steps. The revised approach has been applied since 15 May 2010. Between 9 February and 21 May 2010, a total of about 172kg of low enriched UF6 was fed into the first cascade at PFEP. On 7 April Iran withdrew

5.7kg of UF6 from the first cascade declaring it had been enriched to 19.7% U-235 although non-destructive measurements by the agency indicated enrichment of 19.3% U-235.

The Director General also noted in the report that, after reiterating on 22 January 2010 a request for a complete Design Information Questionnaire (DIQ) for the Fordow Fuel Enrichment Plant (FFEP), the Agency was still waiting for Iran to submit the DIQ. As of 26 May 2010, no centrifuges had been introduced to the facility. The

report additionally noted that construction of the heavy water reactor in Arak was ongoing, and that satellite imagery shows the Heavy Water Production Plant to be in operation again.

The report also noted that in January 2010, the Agency, conducting a Design Information Verification (DIV), was informed by the facility operator that pyroprocessing R&D activities had been initiated at the Jabr Ibn Hayan Multipurpose Research Laboratory (JHL) in Tehran. Pyroprocessing can be conducted to study the electrochemical production of uranium metal, which enables the removal of uranium or plutonium from spent fuel. During a later DIV in April, Agency inspectors observed that the electrochemical cell had been removed.

The Report on Syria highlights Syria's persistent refusal to allow access to information concerning the Dair Alzour site including infrastructure, procurement efforts which Syria stated were related to civilian non-nuclear activities, technical documentation related to the construction of the destroyed building, and access to locations where debris from the destroyed building are now situated. A physical inventory verification (PIV) undertaken at the Miniature Neutron Source Reactor on 31 March 2010 provided the Agency with information involving the undeclared conversion of yellowcake to uranyl nitrate. Syria states the yellowcake's origin was Homs.

On 7 June 2010, the Director General made an introductory <u>statement</u> to the Board focusing on a range of nuclear issues including nuclear safety and security, technical cooperation, and verification of

nuclear non-proliferation. Director General Yukiya Amano also expressed his satisfaction with the results of the 2010 NPT Review Conference and focused on the application of Safeguards in the Democratic People's Republic of Korea, the Islamic Republic of Iran, and the Syrian Arab Republic.

On 31 August, the Director General submitted a report to the Board of Governors entitled Application of Safeguards in the Democratic People's Republic of Korea (DPRK). The Report highlighted that since December 2002 the IAEA has not been able in implement safeguards in the DPRK and, therefore, cannot draw any safeguards conclusions. Additionally, since the secession of the ad hoc monitoring and verification arrangement in the DPRK in April 2009, the IAEA has been unable to monitor or verify nuclear activities within the DPRK and therefore cannot provide any conclusions concerning the DPRK's nuclear activities.

On 6 September, the Director General submitted two reports to the Board of Governors: 1) *Implementation of the NPT Safeguards Agreement and relevant provisions of Security Council resolutions in the Islamic Republic of Iran* and 2) *Implementation of the NPT Safeguards Agreement in the Syrian Arab Republic.* 

In his report on **Iran**, the Director General noted that between 23 November 2009 and 6 August 2010 Iran had produced an additional 995kg of LEU, bringing its total stockpile to 2803kg. The report noted that there were a number of seals that had been broken at the FEP and that the Agency would be evaluating the consequences of

these for safeguards during the next PIV scheduled for October 2010.

The report also indicated that enrichment levels of between 5.0% and 7.1% U-235 (which is higher than that stated in Iran's DIQ) were discovered in a small number of particles from recent environmental samples taken at FEP. The IAEA stated that Iran provided the Agency with a possible explanation for the presence of these particles and that Iran's explanation was not inconsistent with the Agency's findings.

The report also noted that from 9 February 2010 to 20 August 2010 Iran had produced 22kg of UF6 enriched up to 20% U-235 from Cascade 1 at PFEP.

In addition, the report noted that Iran continues to deny the IAEA's request of providing further information regarding construction of FFEP.

The report further noted that Iran had begun transferring fresh fuel to the reactor containment building at the Bushehr Nuclear Power Plant (BNPP).

With respect to the designation of inspectors, the report indicated that Iran objected to two inspectors with experience in Iran's nuclear fuel cycle and facilities. The IAEA stated that the objection to these inspectors by Iran hampers the inspection process and detracts from the Agency's capability to implement effective and efficient safeguards in the country.

The report on **Syria** noted that Damascus had refused to increase its cooperation with the IAEA and to provide access to all relevant information and locations with regards to the Dair Alzour site as requested by the Agency. The Director General reported that the IAEA had not been able to

resolve outstanding issues related to this matter.

The report also noted that the IAEA remained engaged with Syria on clarifying the discovery of anthropogenic uranium particles found at the MNSR. The IAEA provided Syria with results of the March 2010 PIV at MNSR and requested to have discussions concerning inconsistencies discovered by the results. The IAEA met with Syria on 3 September to discuss questions raised by the results and agreed on a plan of action for resolving this issue.

On 23 November, the Director General submitted two reports to the Board of Governors:

1) Implementation of the NPT Safeguards
Agreement and relevant provisions of
Security Council resolutions in the Islamic
Republic of Iran, and 2) Implementation of
the NPT Safeguards Agreement in the Syrian
Arab Republic.

In his report on **Iran**, the Director General noted that contrary to the relevant resolutions of the Board of Governors and the Security Council, Iran has not suspended its enrichment related activities. As of 17 October, 34,737 kg of natural UF6 had been fed into the cascades at the Fuel Enrichment Plant at Natanz, leading to the production of 3,183 kg of low enriched UF6. The estimated enrichment level of Iran's UF6 product is 3.37%.

The Director-General further reported that the Pilot Fuel Enrichment Plant (PFEP), brought into operation in October 2003, accommodates six 164-centrifuge cascades designated to produce LEU enriched up to 20% U-235. Since 13 July 2010, Iran has been feeding low enriched UF6 into the two

interconnected cascades (Cascades 1 and 6). The IAEA conducted a PIV at PFEP on September 18-29 and confirmed that, as of 18 September 2010, 352 kg of low enriched UF6 had been fed into the cascade(s) since 9 February 2010, and that a total of 25.1 kg of UF6 enriched up to 20% U-235 had been produced. Iran declared that the enrichment level of the UF6 product was 19.89%. According to the information provided by Iran, between 19 September 2010 and 19 November 2010, a total of 62.5 kg of UF6 enriched at FEP was fed into the two interconnected cascades and that approximately 7.8 kg of UF6 enriched up to 20% U-235 was produced, resulting in a total of approximately 33 kg of UF6 enriched up to 20% U- since the process began in February 2010.

On 26 September, Iran provided the IAEA with a revised DIQ for the Fordow Fuel Enrichment Plant in Qom, stating that the facility's purpose now includes R&D as well as the production of UF6 enriched up to 5% U-235. The layout of the facility is now changed to a configuration consisting of 12 centrifuge cascades for production and 4 cascades for R&D. The IAEA has verified that the construction of this facility is ongoing. As of 14 November, no centrifuges had been introduced into the facility.

According to the report, the IAEA carried out an inspection and design information verification at the Tehran Research Reactor and the Molybdenum, Iodine and Xenon Radioisotope Production (MIX) Facility on 7 November. The IAEA was able to confirm that there were no ongoing reprocessing related activities at these sites.

Iran has also continued the construction of the IR-40 reactor and other heavy water

related activities. The Agency monitors the construction of IR-40 through the use of satellite imagery.

The IAEA remains concerned about past or current undisclosed nuclear related activities, including activities related to the development of a nuclear payload for a missile.

The report on **Syria** notes that no progress has been made on issues related to the Dair Alzour site and the other three locations allegedly functionally related to it. As time passes, these sites are deteriorating and it is possible that much of the information the IAEA is seeking has been lost entirely. Concerning the Miniature Neutron Source Reactor (MNSR), the report notes that Syria's responses have not resolved previously identified inconsistencies.

On 2 December, IAEA Director General Yukiya Amano addressed the meeting of the Board of Governors. In his remarks, he highlighted the importance of international cooperation, verification issues in the DPRK, Syria, and Iran, the conclusion of an agreement with the Russian Federation that established a reserve of LEU, and the IAEA's Technical Cooperation Programme for 2011, as recommended by the Technical Assistance and Cooperation Committee.

On 3 December, the Board of Governors (BoG) voted to establish a global nuclear fuel bank to indiscriminately supply fuel to states that start a civilian nuclear program. Of the 35 Board members, 28 nations voted for the establishment of the facility, 6 – Venezuela, Tunisia, South Africa, Ecuador, Brazil and Argentina – abstained, while Pakistan formally announced it would not take part in the vote. Concerns that the

fuel bank would undermine states' right to develop indigenous fuel cycle led some of the Board members to abstain.

In 2006, advisor to the NTI Board of Directors Warren Buffet challenged the IAEA to establish a fuel bank and have one or more countries contribute \$100 million, or the equivalent in reactor fuel, to be matched by his contribution of

\$50 million towards the bank. In 2009 this goal was met with a \$10 million donation from Kuwait combined with contributions from the United States, the European Union, Norway and the United Arab Emirates totaling \$157 million. The location and plans for maintaining the bank's fuel supply are not yet decided. However, the president of Kazakhstan Nursultan Nazarbaev previously announced his country's willingness to host the future IAEA fuel bank.

2009: The newly elected Member States on the board for 2008-2009 are: Afghanistan, Albania, Algeria, Argentina, Australia, Brazil, Burkina Faso, Canada, China, Cuba, Ecuador, Egypt, Finland, France, Germany, Ghana, India, Iraq, Ireland, Japan, Lithuania, Malaysia, Mexico, New Zealand, Philippines, Romania, Russian Federation, Saudi Arabia, South Africa, Spain, Switzerland, Turkey, United Kingdom, United States of America, and Uruguay.

The ambassador and resident representative from Algeria, *Mrs. Taous Feroukhi*, was elected chair of the Board of Governors for 2008-2009. Elected vice-chairpersons for 2008-2009 were Ms. Kirsti Kauppi, the governor from Finland, and Mr. Cornel Ferută, the governor from Romania.

On 19 February, the Director General submitted two reports to the Board entitled, *Implementation of the NPT Safeguards*Agreement and relevant provisions of Security Council resolutions 1737 (2006), 1747 (2007), 1803 (2008) and 1835

(2008) in the Islamic Republic of Iran, and Implementation of the NPT Safeguards Agreement in the Syrian Arab Republic.

In his report on **Iran**, the Director General noted that Iran continues to produce and stockpile low enriched uranium (LEU). Physical inventory verification procedures conducted by the IAEA place the total amount of LEU produced (in the form of UF6) at 1,010 kilograms. While Iran successfully installed hundreds of additional centrifuges at Natanz in recent months, it did not increase the number of operating centrifuges at

its declared enrichment facility (the number remains under 4,000). The Director General reported that Iran has begun producing fuel rods for its heavy water IR-40 reactor and that the Agency's request to visit the reactor was denied. Finally, the Director General reported that Iran has made no additional attempts to resolve the Agency's concerns regarding the outstanding issues surrounding the Alleged Studies. Iran maintains that it has fulfilled all of its obligations under the IAEA work plan, and that IAEA safeguards activities in Iran should return to routine status.

In his report on **Syria**, the Director General focused primarily on the previously reported presence of anthropogenic natural uranium particles detected at the Al Kibar site through environmental sampling techniques employed by the Agency's network of analytical laboratories. He described

requests for information and access that the Agency has made of Syria, noting that Syrian responses to date have not sufficiently resolved outstanding questions as to the origin of the uranium particles. Syria maintains that the uranium traces derive from munitions used to strike the site, but according to the report, Agency analysis found a "low probability that the uranium was introduced by the use of missiles." The Director General called on Syria, Israel, and other states with relevant information to cooperate more comprehensively with the ongoing investigation.

On 2 March, the U.S. Permanent
Representative to the IAEA, Ambassador
Gregory Schulte, delivered a <u>statement</u> to
the Board of Governors on behalf of the new
Obama Administration. Speaking ostensibly
on the agenda item of Nuclear Safety,
Ambassador Schulte delivered a wideranging statement that indicated U.S. policy
shifts on issues of consequence for the
Agency. Ambassador Schulte cited, for
example,

U.S. readiness for "direct engagement with Tehran" and "using dialogue with Syria." He asserted that the Obama Administration "seek[s] to strengthen the IAEA and to ensure that the Agency gets the authority, information, people, and technology it needs to do its job," and that the new administration "intends to renew America's commitment to disarmament."

On 5 June, the Director General submitted the following two reports to the Board:

<u>Implementation of the NPT Safeguards</u>

<u>Agreement in the Syrian Arab Republic</u> and

Implementation of the NPT Safeguards
Agreement and relevant provisions of

<u>Security Council resolutions 1737 (2006),</u> <u>1747 (2007),</u>

1803 (2008) and 1835 (2008) in the Islamic Republic of Iran.

On 15 June, in his introductory statement to the Board, the Director General <u>addressed</u> various issues including nuclear power, safety and security, and a proposal for a low enriched uranium (LEU) fuel bank. On the following day, 16 June, Dr. ElBaradei made a <u>statement</u> urging adoption of his submitted budget proposal to the Board of Governors. On 17 June, Dr. ElBaradei made a <u>statement</u> regarding the verification failures in the DPRK, renewed interest by Russian and American presidents for a world free of nuclear weapons, and the multinationalization of the fuel cycle.

On 2 July, at a special meeting, the Board of Governors appointed Ambassador Yukiya Amano of Japan as the new Director General, with the required two-thirds majority vote after six rounds of secret ballots.

On 30 July, the Director General released a report entitled <u>Application of Safeguards in the Democratic People's Republic of Korea.</u>

The report highlighted the Agency's ceased implementation of ad hoc monitoring and verification arrangement at the behest of the DPRK. As a result the Agency has been unable to monitor or verify nuclear activities within the DPRK and therefore cannot provide any conclusions concerning the DPRK's nuclear activities.

On 28 August, Director General Dr. ElBaradei submitted two reports to the Board of Governors on the *Implementation* of the NPT Safeguards Agreement in the Syrian Arab Republic and The

Implementation of NPT Safeguards

Agreement and relevant provisions of

Security Council Resolutions 1737 (2006),

1747 (2007), 1803

(2008), and 1835 (2008) in the Islamic Republic of Iran.

The report on Syria states Syria was cooperating with the Agency in its verification activities at the Miniature Neutron Source Reactor in Damascus. Syria suggested that the accumulation of sample and reference materials used in neutron activation analysis accounted for the existence of uranium particles previously found at the site. The report also notes that Syria has not provided necessary cooperation to permit the Agency to determine the origin of the uranium particles, the nature of the destroyed building at the Dair Alzour site (previously known as Al Kibar) and its relationship to three other locations near the site. Syria claims to be under no obligation to provide further information on the Dair Alzour site due to its allegedly non-nuclear military nature. Syria further refuses to recognize that uranium particles of anthropogenic nature found at the site constitute undeclared nuclear material. The report urges Syria to cooperate with the Agency in its verification activities in accordance with its mandate under Syria's Safeguards Agreement to ensure safeguards are applied to all source and special fissionable material in all peaceful nuclear activities.

In the Iran report, the Director General notes Iran was feeding UF6 into the cascades at the Fuel Enrichment Plant (FEP) at Natanz. Iran has estimated that between November 2009 and July 2009 7942kg of UF6 was fed into the cascades producing 669kg of low

enriched UF6. Also, 37kg of UF6 has also been fed into the Pilot Fuel Enrichment Plant (PFEP) at Natanz. Environmental samples from both plants verify they have been operating as declared, with enrichment levels below 5% U-235.

The report also confirmed the construction of the heavy water research reactor in Arak was still ongoing, particularly noting no reactor vessel was yet present at the site. The report urges Iran to implement the Additional Protocol and the modified text of its Subsidiary Arrangements General Part, Code 3.1 on the early provision of design information.

On 16 November the Director General submitted two reports to the Board of Governors: *Implementation of the NPT Safeguards Agreement and relevant provisions of Security Council resolutions* 1737 (2006), 1747 (2007),

1803 (2008) and 1835 (2008) in the Islamic Republic of Iran and Implementation of the NPT Safeguards Agreement in the Syrian Arab Republic.

In his report on Iran, the Director General most significantly notes Iran's unveiling of a pilot production plant 20 km north of Oom, referred to as the Fordow Fuel Enrichment Plant (FFEP). Iran provided its first DIQ for FFEP on 18 October 2009, and the Agency conducted design information verification (DIV) on 26-27 October. The Agency confirmed the plant corresponded with the design information provided by Iran and that the facility was at an advanced stage of construction, although no centrifuges had yet been introduced to the facility. On 25 and 28 October the Agency held two meetings in Tehran to review the DIQ and to discuss the chronology, status, purpose and

design of the FFEP. During these meetings the Agency questioned Iran's explanation about the purpose of the facility and the chronology of its design and construction, requesting further clarification.

The report notes the Agency continues to verify the non-diversion of declared nuclear material but that the failure to inform the agency about the construction of the new enrichment plant is "inconsistent with the Subsidiary Arrangements to its Safeguards Agreement" and does "not contribute to the building of confidence."

According to the report, Iran estimates that between 18 November 2008 and 30 October 2009, 10,395kg of UF6 was fed into the Fuel Enrichment Plant cascades at Natanz, and 924kg of low enriched UF6 was produced, to a total of 1,763kg of LEU since the startup of FEP. At the Pilot Fuel Enrichment Plant (PFEP) in Natanz 53kg of UF6 was fed into the cascade. Environmental samples at both FEP and PFEP indicate that the declared maximum enrichment level of less than 5% U-235 enrichment has not been exceeded at either site. The report also verified the continued construction of a heavy water research reactor in Arak and the observation of 600 50-litre drums of heavy water at the Uranium Conversion Facility (UCF) at Esfahan. The Agency requested confirmation on the number of drums, their contents and to provide the origin of the heavy water.

In the **Syria** report, the Director General noted that no progress had been made since the last report to clarify any of the outstanding issues relevant to the implementation of safeguards. He noted Syria's lack of cooperation had not permitted the Agency to determine the origin

of the anthropogenic natural uranium particles found in samples taken at the Dair Alzour site. Several Board of Governors members called upon all relevant States to cooperate with the IAEA, and to provide the Agency with all pertinent information in a timely, comprehensive and verifiable manner to facilitate the completion of the IAEA's assessment.

The report also noted the results of environmental sampling taken at the Miniature Neutron Source Reactor (MNSR) "confirmed the presence of anthropogenic natural uranium of a type not in Syria's declared inventory." The Agency intends to carry out an inspection at the MNSR on 17 November 2009.

On 27 November, the Board of Governors adopted a resolution entitled *Implementation* of the NPT Safeguards Agreement and relevant provisions of Security Council resolutions 1737 (2006), 1747 (2007), 1803 (2008) and 1835

(2008) in the Islamic Republic of Iran, the first Board resolution since 2006. This resolution urges Iran to comply fully with United Nations Security Council requirements and relevant Board of Governors resolutions: immediately suspend enrichment activities, including the construction at the Qom facility (Fordow Fuel Enrichment Plant), and urges Iran to implement and ratify the Additional Protocol to its Safeguards Agreement, as well as implement modified Code 3.1 of the Subsidiary Agreement.

On 27 November, the Board of Governors also adopted a resolution entitled <u>Request by</u> the <u>Russian Federation regarding its</u> <u>Initiative to Establish a Reserve of Low</u> <u>Enriched Uranium (LEU) for the Supply of</u>

LEU to the IAEA for its Member States. The resolution authorizes the Director General to implement an Agreement with the Russian Federation to establish a reserve of LEU for supply to the IAEA for its Member States and also to implement future agreements with Member States for the supply of LEU by the IAEA when he/she considers the request fulfills the eligibility criteria included in the agreement with the Russian Federation.

On 1 December, new IAEA Director General Yukiya Amano assumed office after being confirmed for the post by the General Conference in September.

**2008:** The Ambassador and Resident Representative from Chile, *Mr. Milenko E. Skoknic*, was elected chair of the Board of Governors for 2007 – 2008.

On 22 February, Director General Dr. ElBaradei submitted his report entitled Implementation of the NPT Safeguards Agreement and relevant provisions of Security Council Resolutions 1737 (2006) and 1747 (2007) in the Islamic Republic of *Iran*. Most significantly, the report details progress on the clarification of several outstanding issues tied to Iran's past nuclear work. Prior to the release of this report, the Agency had five issue areas on which it sought clarification from Iran to elucidate aspects of its past nuclear activities: uranium contamination at a university, experiments with polonium-210, activities at the Gchine uranium mine, procurement attempts for centrifuge components, a document regarding uranium metal, and the Alleged Studies. According to the report, only the Alleged Studies remain as an outstanding issue, with other issues having been explained by Iran in a manner "consistent

with" or "not inconsistent with" the Agency's findings.

The Director General also reported that Iran had made some technical progress with work on its P-2 centrifuge design, but did not increase its enrichment capacity since the last director general report on Iran in November of 2007.

On 26 May, the Director General issued a report to the Board entitled *Implementation* of the NPT Safeguards Agreement and relevant provisions of Security Council resolutions 1737 (2006), 1747 (2007) and 1803 (2008) in the Islamic Republic of Iran.

The report covers enrichment, reprocessing, heavy water reactor related projects, as well as "other implementation issues" and alleged military dimensions of Iran's nuclear work. The report notes that Iran has made substantial progress on the development and operation of its centrifuges and contains additional details regarding ongoing Agency efforts to clarify issues raised by the Alleged Studies."

The Alleged Studies information, according to the report, appears to be "from multiple sources over different periods of time, is detailed in content, and appears to be generally consistent." The report notes that the Agency has not been authorized by those providing the information to release its full contents to Iran. The report concludes that "the alleged studies on the green salt project, high explosives testing and the missile reentry vehicle project remain a matter of serious concern. [...] Iran may have additional information, in particular on high explosives testing and missile related actives." The report contains annex lists documents shown to Iran and details the Agency's outstanding questions regarding

these documents. On 9 July, a draft of a Safeguards Agreement between the IAEA and India was circulated to the Board of Governors at India's request. The draft agreement outlined a system of facility-specific INFCIRC 66 Rev. 2- based safeguards on facilities that India would designate as civilian in nature. Board Approval of a safeguards agreement with India was widely viewed as one of three main hurdles for the controversial U.S.-India nuclear deal (the remaining two: approval by the NSG and passage of enabling legislation in the U.S. Congress.)

On 1 August, the Board of Governors approved by consensus the <u>Agreement</u> between the <u>Government of India and the IAEA for the Application of Safeguards to Civilian Nuclear Facilities.</u> Described as an "umbrella" arrangement, the agreement allows India to designate some of its nuclear facilities as "civilian." Such facilities then become subject to INFCIRC 66 Rev. 2-type safeguards.

On 2 September, the Director General submitted a report to the Board of Governors entitled Application of Safeguards in the Democratic People's Republic of Korea. The Report highlighted that the IAEA has continued to verify the shutdown status of the Yongbyon and Taechon nuclear facilities and is continuing implementation of the ad hoc monitoring and verification agreement. The IAEA has undertaken a number of activities in the DPRK, including: monitoring disablement activities at the Nuclear Fuel Fabrication Plant and the Radiochemical Laboratory; and, on-going site visits DPRK's 5MWe experimental nuclear power plant, 50MWe nuclear power plant and

200 MWe nuclear power plant. The Report notes with concern that "until the legal status of the DPRK vis-à-vis the NPT had been clarified, the Agency's safeguards responsibilities towards the DPRK remained uncertain."

On 12 September, the Director General submitted a report to the Board entitled *Implementation of the NPT Safeguards*Agreement in the Socialist People's Libyan Arab Jamahiriya. Having achieved substantial cooperation with Libya regarding clarification of its past nuclear activities, the report details what is currently known about Libya's illicit nuclear work. The report concludes that the Agency now "considers that the issues that had been reported to the Board of Governors are no longer outstanding at this stage." It also stipulates that further safeguards activities in Libya will proceed in a routine manner.

On 15 September, the Director General issued a report entitled Implementation of the NPT Safeguards Agreement and relevant provisions of Security Council resolutions 1737 (2006), 1747 (2007) and 1803 (2008) in the Islamic Republic of Iran. The report covers enrichment, reprocessing, heavy water projects, implementation issues and the alleged military dimensions of Iran's nuclear program. The report affirms that Iran is making steady progress in its installation and operation of gas centrifuges for enrichment work, and is the first report to quantify the amount of low enriched uranium (LEU) Iran has produced: 480 kilograms.

The report refers to the possible involvement of "foreign expertise" in alleged Iranian work on the "symmetrical initiation of a hemispherical high explosive charge suitable for an implosion type nuclear device," although no specifics are provided. Otherwise, the primary focus of the report states the lack of progress on the clarification of the Alleged Studies. The Agency continues, however, to verify the non-diversion of declared nuclear material in Iran.

On 19 November, the Director General submitted two reports to the Board, one concerning developments in the implementation of safeguards in Iran, and the other regarding Syria.

In Implementation of the NPT Safeguards
Agreement and relevant provisions of
Security Council resolutions 1737 (2006),
1747 (2007),

1803 (2008) and 1835 (2008) in the Islamic Republic of Iran, the Director General reports no additional progress on resolving issues tied to the Alleged Studies, the veracity of which Iran continues to dispute. According to the report, Iran succeeded in producing a total of 630 kilograms of low enriched uranium (LEU) and plans to significantly increase the number of operational centrifuges at its enrichment plant in Natanz. The report notes with concern that Iran did not permit a scheduled Agency visit to the heavy water reactor under construction in Arak. Finally, the report affirms the continued non-diversion of declared nuclear material in Iran.

In Implementation of the NPT Safeguards
Agreement in the Syrian Arab Republic, the
Director General reports on developments
related to allegations that Syria was in the
process of constructing an undeclared
nuclear reactor at a site that was bombed by
Israel in April of 2008. The report states that
a "significant number" of natural uranium

particles were detected via environmental sampling techniques during the Agency's investigation of the Al Kibar site. Syria maintains that the building in question was a military installation and not a nuclear facility. The Director General notes that the IAEA's investigation was "severely hampered" by Israel's "unilateral use of force" and Syria's subsequent demolition and construction activities at Al Kibar.

**2007:** The Ambassador and resident representative from Slovenia, *Mr. Ernest Petrič*, was elected chair of the Board of Governors for 2006-2007.

On 22 February, Dr. ElBaradei released a report entitled *Implementation of the NPT Safeguards Agreement and Relevant Provisions of Security Council Resolution* 1737 (2006) in the Islamic Republic of Iran.

The report covered such issues as: enrichment, reprocessing activities, heavy water projects, outstanding issues (including centrifuge technology, uranium metal, and plutonium experiments), and transparency measures. Essentially, the six-page report detailed Iran's current stance on nuclear development. Major points include Iran's discord with any transparency measures, its continuation of enrichment activities, and the operation of single machines. Encouragingly, the IAEA's physical inventory of verification remains congruent with Iran's inventory.

This report was issued in response to the UN Security Council's adoption of Resolution 1737. The Resolution states that Iran should suspend all enrichment and reprocessing activities and work on heavy water related projects. Furthermore, Iran shall provide the IAEA with facility access in order to verify suspension. This compliance shall be

reflected in the previously- mentioned report by the Director General.

On 23 May, Dr. ElBaradei submitted his report entitled *Implementation of the NPT Safeguards Agreement and Relevant Provisions of Security Council Resolutions* (1696, 1737, 1747) in the *Islamic Republic of Iran*. This report was submitted in accordance with UN Security Council Resolution 1747 which requested the Director General to report on Iran's compliance with Resolution 1737 and all other steps required by the Board of Governors.

The report addressed a number of core issues related to Iran's nuclear program including enrichment and reprocessing activities, heavy water related projects, and a compilation of outstanding issues.

The Director General's report indicated that Iran has not suspended its enrichment activities and has continued the operation of its pilot fuel enrichment plant while starting to feed cascades with uranium hexafluoride at its fuel enrichment plant. Iran has also continued its heavy water related projects, along with the construction of its IR-40 reactor.

The report noted that in the absence of the information that Iran had previously provided to the IAEA, including information pertaining to the Additional Protocol, the IAEA's knowledge of certain aspects of Iran's nuclear activities has deteriorated over time.

The IAEA also reported that it remains unable to make further progress in verifying the scope and nature of the Iranian program. Despite this, the report stated that the IAEA has been able to verify that no materials

have been diverted from Iran's declared nuclear program.

On 15 June, Director General Mohamed ElBaradei made an exceptional intervention at the conclusion of discussions regarding agenda item 5, Report of the program and budget committee. Noting that the Director General is not usually directly engaged in budget matters, he expressed deep dissatisfaction with the proposed budget, indicating that it did not meet "by any stretch of the imagination" the Agency's basic and essential requirements. He stressed that the lack of funds would jeopardize the Agency's ability to fulfill its mandates.

Dr. ElBaradei cited the continual erosion of the Agency's safeguards functions, the inadequacy of the Emergency Response Center implementation of the Notification and Assistance Conventions, and a 90% reliance on extra-budgetary contributions in the nuclear security area as possible consequences of insufficient budget growth. In conclusion, the Director General conveyed to the Board that the implications of their decisions would mean the difference between a mediocre or efficient and effective Agency, able to carry out the activities critical to the development of international peace and security.

On 17 August, Director General Dr.
Mohamed ElBaradei submitted his report entitled <u>Application of Safeguards in the Democratic People's Republic of Korea</u>
(DPRK). The Report highlighted that the IAEA has continued to verify the shutdown status of the Yongbyon nuclear facility and is continuing implementation of the ad hoc monitoring and verification agreement. The IAEA has undertaken a number of activities in the DPRK, including: identifying key

processes and essential equipment involved in the conversion of yellow cake to uranium metal; identifying key processes and essential equipment in DPRK's Radiochemical Laboratory; and, site visits DPRK's 5MWe experimental nuclear power plant, 50MWe nuclear power plant and 200 MWe nuclear power plant. The Report notes with concern the fact that the IAEA has not performed any verification activities in the DPRK since December 2002, and, as a result, cannot draw any conclusions regarding DPRK's nuclear activities.

On 30 August, Director General Dr. Mohamed ElBaradei submitted his report entitled *Implementation of the NPT Safeguards Agreement in the Islamic Republic of Iran*. The report was again submitted in accordance with UN Security Council Resolution 1747.

The report acknowledged significant cooperation from Iran, verified the nondiversion of declared nuclear material in Iran, encouraged Iran to slow enrichment although Iran continues to test single centrifuge machines and has not suspended the enrichment processes. The report declared that the Agency remained unable to verify certain aspects relevant to the scope and nature of Iran's nuclear program. The report stated that Iran was operating 2000 centrifuges, an amount significantly less than the 3000 alleged by Iran. The report also affirmed that the highest U-235 enrichment level measured by the Agency was 3.7%, not 4.8% enrichment, as stated by Iran.

The Report also included a *Work Plan*, negotiated by the IAEA in cooperation with Iran, it was designed to allow Iran to cooperate with the IAEA and it intends to

resolve all outstanding verification issues. In his *Introductory Statement to the Board of Governors*, Dr. ElBaradei stressed the importance of full cooperation from Iran, while at the same time underlining the importance of a "time-out" of sanctions against Iran in order resume negotiations.

On 15 November Dr. ElBaradei released a report entitled *Implementation of the NPT Safeguards Agreement and relevant provisions of Security Council resolutions* 1737 (2006) and 1747 (2007) in the Islamic Republic of Iran. The detailed report covered topics including the acquisition of fuel cycle facilities and technologies dating from 1972, the acquisition of P-1, P-2 and other centrifuge technologies, current enrichment related activities, reprocessing technologies, heavy water related projects, and uranium conversion.

In the report's summary, Dr. ElBaradei stated that "the Agency has been able to verify the non-diversion of declared nuclear materials in Iran," but stressed that as Iran has not implemented the Additional Protocol, the Agency's knowledge concerning the current nuclear program is "diminishing". Dr. ElBaradei further reported that Iran has not suspended enrichment related activities and has continued the operation of its heavy water production plant. Iran's past and current centrifuge enrichment program continues to be a major issue; within the following weeks the Agency plans to address these concerns, along with subject of contaminated centrifuges. In conclusion, Dr. ElBaradei reiterated the importance of Iran's adherence to the Additional Protocol so the Agency will then be able to provide credible assurances concerning the absence of

undeclared nuclear material and activities in Iran.

**2006:** The Chair of the Board of Governors from 2005-2006 was Ambassador and Resident Representative from Japan, *Mr. Yukiya Amano*.

On 3 January, the Director General informed the Board of Governors of a Note Verbale in which Iran notified the IAEA of its decision to resume "R&D activities on the peaceful nuclear energy programme which has been suspended as part of its expanded voluntary and non-legally binding suspension." On 2 February, the Board of Governors convened at a special meeting to discuss Iran's nuclear program. During his briefing to the press, the Director General expressed hopes that Iran would "continue to cooperate with the Agency, to clarify remaining outstanding issues."

On 4 February 2006, the Board of Governors adopted the resolution <u>Implementation of the NPT Safeguards</u> Agreement in the Islamic Republic of Iran.

On 27 February 2006, Dr. ElBaradei released a report entitled *Implementation of* the NPT Safeguards Agreement in the Islamic Republic of Iran. This report discussed the acquisition of P-2 Centrifuge technology, voluntary implementation of the Additional Protocol, transparency issues, uranium metal and plutonium experiments, and enrichment. Essentially, the report summarizes Iran's development of the nuclear fuel cycle and any discords the nation may have with international and nuclear agreements. Overall, the report called attention to some states' lack of confidence in Iran's nuclear intentions and maintained that the Agency's

verification of the Iranian program remains an on-going process.

On 28 April 2006, the IAEA released Dr. ElBaradei's report entitled *Implementation* of the NPT Safeguards Agreement in the Islamic Republic of Iran. The report features a chronology of the Iranian nuclear program beginning in March 2006 and emphasized issues such as enrichment, contamination, uranium and plutonium, heavy water reactors, and general implementation issues. Furthermore, the report creates an overall account of Iran's nuclear programs and intentions.

On 8 June, the <u>Report of the Director</u> <u>General</u> stated that on 6 June 2006, Iran "started feeding UF6 into the 164-machine cascade." The report further stipulated that the IAEA is conducting ongoing investigations of the containment issue in regards to Iran's enrichment program. Other investigations include: the acquisition of P-1 and P-2 centrifuge technology, information regarding uranium metal via foreign intermediaries, plutonium experiments and transparency visits to be conducted by the IAEA.

The 31 August <u>report</u> stated that Iran was showing no signs of freezing enrichment and that the feeding of UF6 into a 164-machine cascade resumed on 24 August. New traces of HEU particles have also been found at the Karaj Waste Storage Facility.

On 14 November, the IAEA released a *report* to the Board of Governors that revealed new details pertaining to the lab testing of enriched uranium samples, contained new information concerning the additional findings of plutonium particles from storage containers at the Karaj Waste Storage Facility, and confirmation that Iran

was progressing steadily with uranium enrichment.

**2005:** The Chair of the Board of Governors from 2004-2005 was Ambassador and Permanent Representative from Canada, <u>Ms. Ingrid Hall.</u>

On 14 June, the Director General, in a statement to the Board of Governors, noted a proposal by the United States which aimed to establish a committee to consider the ways and means to strengthen the Safeguards system. The Director General expressed his hope that the board will be in a position to act on this proposal at its June session.

On 11 August, the Board of Governors adopted resolution <u>GOV/2005/64</u> regarding the implementation of IAEA safeguards in Iran. The resolution expresses serious concern over Iran's decision to resume conversion activities at the Uranium Conversion Facility in Isfahan. It urges Iran to re-establish full suspension of all enrichment-related activities on the same voluntary, non-legally binding basis as requested in previous board resolutions, and to permit the Director General to reinstate the seals that have been removed at the Uranium Conversion Facility in Esfahan.

On 2 September, the Director General <u>reported</u> to the Board of Governors on the developments related to the implementation of IAEA safeguards in Iran since November 2004. The report notes that IAEA analysis supports Iran's claim that HEU contamination on its centrifuges stems from Pakistan and further developments in four areas relating to the IAEA's verification of Iran's P-1 centrifuge enrichment program.

On 23 September, the Board of Governors agreed on modifications to the Small Quantities Protocol (SQP) to strengthen the safeguards system. The modifications require states to provide initial reports to the IAEA on all their nuclear material and early design information for any planned nuclear facilities, and reinstate the IAEA's right to conduct inspections in SQP states. The previous SQP text did not require states to report small amounts of nuclear material to the IAEA.

On 24 September, the Board of Governors adopted <u>Resolution GOV/2005/77</u> in order to facilitate cooperation and transparency measures with Iran. Major points include suspended enrichment, the reconsideration of heavy water reactors, the ratification of the Additional Protocol, and the discussion of dual use equipment.

On 18 November the Director General released a report entitled *Implementation of the NPT Safeguards Agreement in the Islamic Republic of Iran.* The report is divided into two main segments:

Developments since September 2005 and Current Overall Assessment. The first segment discusses contamination, enrichment programs, implementation issues (particularly those of the Additional Protocol) and program suspension. The second segment pertains to the continued investigation of Iran's nuclear programs and intentions.

On 24 November, the Director General <u>updated</u> the Board of Governors on the implementation of safeguards in the DPRK. The Director General stated that the agency has not performed any verification activities in the DPRK since December 2002 and therefore cannot provide any assurance

about DPRK's nuclear activities since that time.

**2004**: The chair of the Board of Governors for 2003-2004 was Ambassador and Resident Representative of Spain <u>Mr. Antonio Nunez Garcia-Sauco.</u>

On 24 February, the Director General presented his report on the *Implementation of Safeguards in Iran*. He emphasized the progress made by Iran as Tehran granted greater access to inspectors and suspended the reprocessing and uranium enrichment processes. He expressed concern that Iran's reporting had not contained any information on P2 centrifuges and asked for greater cooperation from Iran and from the countries that sold such equipment to Iran.

On 13 March, the Board of Governors met to approve draft resolution GOV/2004/20 regarding the implementation of IAEA safeguards in Iran.

During this meeting, the Iranian delegation claimed many of the previous outstanding issues resolved, pointed to the Director General's repeated statements describing the implementation of IAEA safeguards in Iran as a "work in progress," and praised Iran's "extensive active cooperation." Ultimately, the Board of Governors decided to adopt GOV/2004/20 without a vote. This resolution deferred Iran's degree of compliance with IAEA safeguards and the Board's response to a number of omissions from Iran's declarations until its June meeting. The resolution also welcomed Iran's voluntary suspension of enrichment activities and its signature of the Additional Protocol.

In March, the Board of Governors approved several measures to strengthen international

cooperation in nuclear, radiation, and transport safety and waste management. These measures include the *Code of* Conduct on the Safety of Research Reactors, which establishes guidelines for the licensing, construction, and operation of research reactors: the Action Plan for the Development and Application of IAEA Safety Standards, which covers thematic areas as well as activities and facilities: the International Action Plan on the Radiation Protection of the Environment from the Effects of Ionizing Radiation; and the Action Plan for the Safety of Transport of Radioactive Material, which provides direction for IAEA transport safety activities over the next five years. Action areas include review and revision of the Regulations for the Safe Transport of Radioactive Material, refining of the review process, compliance and quality assurance considerations, the issue of denial of shipments, emergency response, liability, and communication.

The 1 June <u>Report of the Director General</u> on Iran found that "Iran repeatedly misstated details about its nuclear program and pursued uranium enrichment technology more aggressively than it initially admitted."

On 18 June 2004, the Board of Governors adopted <u>Resolution GOV/2004/49</u>. This resolution deplored Iran's lack of full cooperation, stressed the importance of Additional Protocol ratification, suspended enrichment, and requested Iran to further develop program transparency.

On 30 August, the IAEA released the Director General's report <u>GOV/2004/59</u> concerning Libya's decision in late 2003 to abandon its nuclear program and the procedural issues conducted by the IAEA.

On 1 September 2004, the IAEA released the Director General's report entitled *Implementation of the NPT Safeguards*Agreements in the Islamic Republic of Iran.

The 24-page report emphasized Iran's nuclear chronology, outstanding issues (such as centrifuge technology, enrichment, plutonium experiments, hot cells, the Additional Protocol, and program suspension), and future progression. The Annex of the report included a discussion on verification activities, *inter alia*: uranium conversion and enrichment, irradiation and reprocessing experiments, heavy water reactor programs, and transparency and suspension prospects.

On 18 September, the Resolution GOV/2004/79 of the Board of Governors called on Iran to suspend enrichment related activities along with the construction of the heavy water reactor at Arak.

On 24 September, the board's resolution noted with concern DPRK's numerous official statements declaring its intention to build up a nuclear deterrent force and its announcement that it reprocessed 800 spent fuel rods; the IAEA called on DPRK to completely and promptly dismantle any nuclear weapons program.

On 15 November the Director General submitted his report on the *Implementation of Safeguards in Iran*, which noted that while there is no evidence of diverted nuclear material, there are unresolved issues concerning Iran's nuclear programme.

On 29 November, the Resolution <u>GOV/2004/90</u> of the Board of Governors welcomed the <u>EU3- Iran agreement</u> on the suspension of enrichment related activities

and acknowledged that the suspension was voluntary.

2003: On 6 January, the Board of Governors adopted Resolution GOV/2003/3. The Resolution reiterated calls to the DPRK to comply with its safeguards agreement and called upon the DPRK to co-operate urgently and fully with the IAEA by: 1) allowing the return of IAEA inspectors and safeguards equipment; 2) complying with Board of Governors Resolution GOV/2002/60;

3) enabling the IAEA to verify that all nuclear materials are declared and subject to safeguards; and meeting with IAEA officials.

On 22 January, the Board of Governors adopted Resolution GOV/2003/4 in response to statements made by the DPRK on resolutions to GOV/2003/3 and GOV/2002/60. The resolution noted that "the DPRK has shown no willingness to undertake the steps called for by the Board in the resolution set out in document GOV/2003/3

... exacerbated the situation by declaring, as noted above, that as of 11 January 2003 it is no longer a State Party to the NPT ... [and] declared in a statement dated 10 January 2003, reported by the Korean Central News Agency, that it is "totally free from the binding force of the safeguards accord with the IAEA" pursuant to the NPT." The IAEA remains unable to verify the non-diversion of nuclear material in the DPRK.

On 16 June, the Board of Governors met for its second meeting of 2003. The agenda consisted of a broad range of issues, including the agency's <u>Annual Report for</u> 2002, the Technical Co- operation Report for

2002, the report of the Programme and Budget Committee, as well as nuclear verification and the prevention of nuclear terrorism. On 18 June, the meeting focused attention on Iran's failure to comply with IAEA safeguards. The board considered an agency report following a series of visits to Iran by Director General Mohamed ElBaradei and other senior IAEA officials following allegations that Iran is completing two secret nuclear facilities— a uranium enrichment facility at Natanz and a heavy water production plant near Arak. The report indicated that Iran failed to meet its obligations under its IAEA Safeguards Agreement with respect to the reporting of nuclear material, the subsequent processing and use of that material, and the declaration of facilities where the material was stored. The chair of the board, Kuwaiti Ambassador Nabeela Al-Mulla, referred to the findings of the IAEA report on Iran in her summary of the meeting, thereby reflecting the board's concern that Iran failed to meet its obligations under its safeguards agreement (for further information, see Safeguards noncompliance, below,)

The primary issues addressed in the 2002 Annual Report were nuclear safety, nuclear security, compliance, nuclear terrorism, and the strengthening of safeguards. ElBaradei noted specifically the need for comprehensive assurances and integrated safeguards for a more effective and efficient IAEA verification system. The draft Annual Report for 2002 summarizes the scope and results of agency activities throughout the year, with an introductory chapter that considers the agency's work within the context of overall nuclear developments and key related issues.

On 18 July, following intense consultations among Member States, the Program and Budget Committee (PBC) agreed upon the program and budget for 2004-2005. The proposed *budget*, approved by the General Conference on 18 September, marks the first significant increase in the agency's funding since the late 1980s. The current regular budget of \$245 million will see an initial increase of \$15 million, and will grow to \$25 million by 2007. The majority of the increase will go toward the verification program, which has increasingly had to rely on extra- budgetary funds to fulfill its growing number of mandates.

**2002:** On 19 March 2002, the IAEA Board of Governors approved in principle a plan of action to upgrade worldwide protection against acts of terrorism involving nuclear or radioactive materials. The action plan consists of eight activity areas: physical protection of nuclear material and nuclear facilities; detection of malicious activities (such as illicit trafficking) involving nuclear and other radioactive materials; strengthening of State systems for nuclear material accountancy and control; security of radioactive sources; the assessment of safety and security related vulnerabilities at nuclear facilities; response to malicious acts or threats thereof; the adherence to international agreements and guidelines; and enhancement of program co-ordination and information management for nuclear security-related matters. In recognition that security measures are the responsibility of each State, IAEA activities are meant to complement the protection measures taken by the individual States. The extra budgetary Nuclear Security Fund will primarily fund activities which fall under the action plan.

On 18-22 March 2002, the Board of Governors also approved a "blueprint," known as "The Conceptual Framework for Integrated Safeguards." The blueprint represents a new approach to safeguards implementation, which integrates all the safeguards measures currently available to the Agency in the most optimum way. This framework will guide the Secretariat in fulfilling its ongoing safeguards obligations and responsibilities.

On 29 November, the IAEA Board of Governors adopted Resolution GOV/2002/60 on the implementation of IAEA safeguards in the DPRK. The Resolution noted reports of an unsafeguarded uranium enrichment program, "urges the DPRK to give up any nuclear weapons programme, expeditiously and in a verifiable manner," and calls upon "the DPRK to comply fully and promptly with its safeguards agreement and to cooperate fully with the Agency to that end."

2001: The Board of Governors held its meeting in Vienna on 11-14 June 2001 to review the implementation of IAEA safeguards in the year 2000. The Board concluded that in 2000 in the 140 States (and Taiwan or China), which had Safeguards Agreements in force, the Agency found no indication of diversion of nuclear material placed under safeguards or of misuse of facilities, equipment, or non-nuclear material placed under safeguards.

**2000:** On 5-8 June 2000, the Board of Governors reviewed the implementation of IAEA safeguards in the past year. In 1999, the IAEA concluded that in States with Safeguards Agreements in force, declared nuclear material and other items placed under safeguards remained in peaceful

nuclear activities or otherwise adequately accounted for. The Secretariat found no indication that the nuclear material declared and placed under safeguards had been diverted for any military purpose or for purposes unknown, or misuse of facilities, equipment, and non-nuclear materials placed under safeguards.

**1997:** On 16 May 1997, the Board of Governors approved new strengthened measures for use by its inspectors who verify States' compliance regarding commitments not to produce nuclear weapons. The new measures are detailed in an agreed Protocol under which countries would accept stronger, more intrusive verifications on their territories. The key objective of the new measures enhances the IAEA's capability to detect possible clandestine nuclear activities in NNWS and thus to increase confidence that these States are abiding by their obligations. However, while the protocol remains part of a plan for strengthened and more efficient safeguards in NNWS, it also contains measures that could improve safeguards in other States, including nuclear-weapon States. These new measures provide enhanced access for inspectors, such as access to more information about States' nuclear programs, current and planned, and access to more locations on their territories. Inspectors will have access not only to nuclear sites but also to other locations that could contribute to a nuclear program, such as research or manufacturing facilities. The new measures include use of state-of-the-art technologies to trace nuclear activity through samples taken from the environment and remote operation surveillance and monitoring systems at key locations in the inspected State. States accepting the protocol will also be required to simplify the designation of

inspectors and visa requirements for them, thus facilitating inspections at sites on short notice. Many of the new measures have undergone extensive field trials in cooperating Member States and build on reinforcing steps already implemented under the IAEA's existing legal authority.