

LESSONS LEARNED FROM THE IPPAS FOLLOW-UP MISSION TO HUNGARY

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- **1997. 1**st **IPPAS** mission to Hungary
- 2011. New security regime was established

 \rightarrow Govt. Decree 190/2011. (IX. 19.) Korm. on physical protection was promulgated

- 2012. June → the IAEA received the request of the Government of Hungary to conduct a 2nd
 IPPAS mission
- 2nd IPPAS mission to Hungary in May June 2013

HAEA prepared and delivered a **package of advance documents** including:

- detailed overview of the Hungarian nuclear applications
- legal system and the regulatory regime
- translated versions of the relevant laws, physical protection regulatory guidelines, a sample license and an inspection record



Scope of the mission 2013

- Review of the Hungarian nuclear security legislative and regulatory framework, regulatory practices (licensing, inspections and enforcement).
- Review and evaluation of the physical protection systems (Budapest Research Reactor, Central Isotope Storage Facility, Paks NPP and Spent Fuel Interim Storage Facility).
- Assessment of the physical protection arrangements for transport.
- Interface with nuclear material accountancy procedures and computer security related issues.





Hungarian Atomic Energy Authority

- Paks NPP
- Spent Fuel Interim Storage Facility (SFISF)
- Training Reactor
- Budapest Research Reactor
- Radioactive Waste Treatment and Disposal Facility (RWTDF)
- Institute of Isotopes Co., Ltd.
- Agroster Irradiation Ltd.
- Hungarian Trade Licensing Office
- National Institute of Oncology

Site visits 2013





Budapest Research Reactor







RWTDF



SFISF



Results of the IPPAS mission 2013

The IPPAS Team concluded that nuclear security within Hungary has been significantly enhanced in recent years.

- 9 recommendations
- 57 suggestions
- 12 good practices

| | Recommendation | Suggestion | Good practice |
|---|----------------|------------|---------------|
| Hungarian nuclear security legislative and regulatory framework | 2 | 7 | 4 |
| Physical protection systems (sites) | 6 | 44 | 8 |
| Transport | 1 | 6 | - |

Part of the mission report is classified, but national review part is publicly available.



Activity between 2013-2017

National Action Plan was developed based on the IPPAS Report



Separate Regulatory Decisions with determined deadlines were issued to obligate the licensees to complete their planned actions.



Preparation of IPPAS Follow-up

- 2015 June → the IAEA received the request of the HAEA to conduct an IPPAS Follow-up mission
- 2017 May → Advance Information Package was prepared and delivered
- IPPAS Follow-up mission 26 June-7 July 2017

Objectives of the follow-up mission:

- Assess the implementation of the recommendations and suggestions provided by the 2013 IPPAS mission
- Review the current status of the national nuclear security regime of nuclear and other radioactive material, associated facilities and associated activities
- Review the current status of nuclear security measures, including nuclear material accountancy and control, at Paks NPP and at RWTDF



Scope of the IPPAS Follow-up

- Nuclear security legislative and regulatory framework for nuclear and other radioactive material and associated facilities
- Regulatory practices (licensing, inspections and enforcement)
- Coordination between organisations involved in nuclear security
- Computer security
- Current physical protection systems at:
 - Paks NPP
 - RWTDF



- Security arrangements concerning the construction of planned two new units of Paks II
- Nuclear material accounting and control for security (using draft IPPAS module 6) at state level and at the facilities



Conclusions of IPPAS Team

All 9 Recommendations have been CLOSED 56 of 57 Suggestions have been CLOSED



Significant Accomplishments:

- Placing Radiation Protection under the competancy of HAEA
- Improvements to Government Decrees
- Further development of Computer Security Programs
- Revision of Regulatory Guides, including for lost/stolen radioactive sources



Conclusions cont'd

Results:

4 new recommendations20 new suggestions10 new good practices



- The State continues to improve its Physical Protection Regime from a high bar
- National level legislation and regulations are in line with related international conventions (A/CPPNM) and IAEA's recommendations (NSS 13, also INFCIRC/225/Rev.5)
- Well integrated system of security, safeguards and safety



Conclusions of IPPAS Team Facility level - **Paks NPP**

- All recommendations and suggestions from 2013 IPPAS mission are implemented and can be considered CLOS^C
- Significant Improvement since 2013
- Comprehensitve nuclear security culture Program
- Further development of computer security is required

Results:

- 1 New recommendation
- 4 New suggestions
- 2 New good practices





Conclusions of IPPAS Team Facility level - **RWTDF**

Püspökszilágy RWTDF \rightarrow low and intermediate level radioactive waste

- All recommendations and suggestions from 2013 IPPAS mis have been implemented and can be considered CLOSED
- Significant security upgrades have been applied
- Overall security exceeds IAEA guidance

Results:

- 1 New recommendation
- 2 New suggestions
- 1 New good practices





- The IPPAS Team concluded that Hungary has a well established nuclear security regime and made significant improvement since the previous 2013 mission.
- Final report has received by HAEA at the end of September.



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