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## INTERNATIONAL COOPERATION BETWEEN AUSTRALIA AND GERMANY IN THE NUCLEAR SPHERE IN 1991-2011

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# МЕЖДУНАРОДНОЕ СОТРУДНИЧЕСТВО МЕЖДУ АВСТРАЛИЕЙ И ГЕРМАНИЕЙ В ЯДЕРНОЙ СФЕРЕ В 1991-2011 ГГ.

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Abstract: This paper features a concise analysis of the key tracks of bilateral cooperation in the nuclear field between Australia and Germany. The fact that both countries belong to NNWSs (non-nuclear-weapon states) predetermined their similar approach to various aspects of the nuclear factor. We take into account both major universal and specialised international organisations as well as informal platforms for forming a dialogue between the two actors. The article also touches upon interaction of the countries on the global nuclear raw materials market and in the

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sphere of joint R&D projects. In general, one can conclude that collaboration in the nuclear area fits within the agenda of the Australia-Germany relations at the turn of the  $21^{th}$  century.

**Keywords:** Australia, Commonwealth of Australia, Germany, Federal Republic of Germany, international cooperation, nuclear nonproliferation.

**Реферат:** В этой работе представлен сжатый анализ ключевых направлений двустороннего сотрудничества в ядерной области между Австралией и Германией. Тот факт, что обе страны принадлежат к НЯОГ (государствам, не обладающим ядерным оружием), предопределил их схожее отношение к различным аспектам ядерного фактора. Принимаются во важнейшие универсальные специализированные внимание как uмеждународные организации, так uнеформальные площадки для диалога между двумя акторами. В выстраивания статье затрагивается взаимодействие стран на мировом рынке ядерного сырья и реализация совместных проектов в сфере НИОКР. В целом, можно сделать вывод, что кооперация по ядерной проблематике вписывается в повестку дня австралийско-германских отношений на рубеже XX-XXI вв.

**Ключевые слова:** Австралия, Австралийский Союз, Германия, Федеративная Республика Германия, международное сотрудничество, ядерное нераспространение.

Bilateral relations between the Commonwealth of Australia and the Federal Republic of Germany can be evaluated as «rich and robust» on the whole, according to former Prime Minister and Minister for Foreign

Affairs of Australia Kevin Rudd [9]. Both states can be regarded as major actors in the modern system of international relations, highly developed economies and leaders of the processes of integration in the corresponding regions. Regardless of

the so-called «tyranny of distances» (a term coined by the Polish researcher Lucjan Wolanowski), representatives of both Australia and Germany repeatedly underlined the importance of maintaining these bilateral ties in the future. 2012. these In countries officially celebrated 60 years since the establishment of the international ties [10, p. 89]. Thus, it is no wonder that cooperation between these two states is multifaceted and productive in a whole number of areas, and nuclear sphere is no exception.

Nuclear agenda (understood in a wide sense) is of considerable significance for both countries mentioned. For Australia. it is connected with the uranium raw materials extraction and exports in the first place, as well as R&D activities (in particular, thanks to OPAL research specialised reactor and several organisations), whereas in Germany, it is all about using nuclear energy for electricity generation, though it is mention 2011 necessary concerning planned nuclear phaseout.

Also, to some extent, nuclear factor has to do with American tactical nuclear weapons on the territory of Germany under NATO's nuclear sharing policy. However, some of the aspects remain equally relevant for both states: for instance, initiatives in the sphere of non-proliferation, regulation of the nuclear issues in the international law, technological novelties in the nuclear sphere (e.g. nuclear medicine).

In fact, one can observe different layers of interaction between Germany and Australia in the nuclear field: on governmental level. the between political parties, business companies, civil society actors (i.e. nongovernmental organisations) and scientific communities. This article may be considered as an attempt to various of this cover aspects cooperation over the last two decades.

It goes without saying that active participation and involvement of Australia and Germany in the international organisations dealing with nuclear problems contributes a great deal to the development of relations

between these countries. Such cooperation is maintained at the highest level, including the United Nations Organisation with its corresponding organs, commissions and committees (such as UN Office for Disarmament Affairs, established in January 1998). It is also essential to take consideration international obligations undertaken by both states under the treaties and other acts of international legislation. For example, as for the under the 1968 NPT agreements (Treaty on the Non-Proliferation of Nuclear Weapons), providing nuclear non-proliferation guarantees global scale, Germany and Australia, having signed and ratified this basic document of the modern nonproliferation regime, interact during the NPT Review Conferences that take place every five years. As such, the Commonwealth of Australia Federal Republic of Germany made their contribution to the indefinite extension of the NPT in 1995. One more illustration for that interaction was the creation of Non-Proliferation

and Disarmament Initiative (NDPI) in 2010 [7], initially chaired by Australia and Japan (Germany is one of other eight members). Its chief goal was the implementation of 2010 NPT Review Conference decisions. Even in the process of preparation for the 2015 Review Conference, Australia, together with Germany and a number of other countries, collaborated closely on a number of working papers, e.g. dealing with transparency, implementation of the New START Treaty and nonproliferation in certain problematic regions [8]. The issue of radioactive waste management and exports is also among the pressing ones for both countries (Australian officials and experts refer to the German experience with that in their reports).

One more international platform for collaboration between Australia and Germany in terms of nuclear non-proliferation is Zangger Committee (Nuclear Exporters Committee). Again, the Commonwealth of Australia and the Federal Republic of Germany contacted with each other in this

Committee within the framework of NPT Review Conferences. Working papers on safeguards and multilateral nuclear supply principles were presented at these events in 1995, 2000, 2005, 2010 and 2015, Germany Australia being and among submitters. Nuclear Suppliers' Group is another multilateral yet body concerned with the issues of nonproliferation (both Germany and Australia are its members). initiative to facilitate the establishment of nuclear-weapons-free zone in the Middle East was strongly supported by Australia and Germany (as a part of European Union) as well.

It would be impossible to omit the topic of cooperation of the two countries within the IAEA (International Atomic Energy Agency). Australia and West Germany were among its founding members in 1957. The representatives from both states have the opportunity to negotiate within the Board of Governors of the International Atomic Energy Agency. As for the concrete steps, Australia and

Germany were financially supporting IAEA Action Plan with the purpose to prevent the threat of nuclear terrorism [11].

Australia and Germany signed and ratified CTBT (Comprehensive Nuclear-Test-Ban Treaty) shortly after it was adopted by the UN General Assembly [4]. The two countries interact within the Preparatory Commission at the Organisation of the Treaty, CTBTO, being Signatory States.

The impact of the nuclear factor bilateral economic relations on primarily comprises uranium trade. Such situation can be explained by the traditional role of Australia as a major exporter of raw materials on the world market [1, p. 123], whereas Germany is more likely to import nuclear fuel. Australian triuranium octoxide (U<sub>3</sub>O<sub>8</sub>) exported to Germany in the framework of trade connections with the European Union. However, taking into account bilateral trade statistics, figures on exports of uranium ores from Australia to Germany were rather stable in the 1990s-2000s [12].Certainly. Germany cannot be compared with France (main importer of the Australian uranium among European countries) in this regard: more than 70% of French electricity is produced on nuclear power plants (in Germany it was around 25% at the average in 1990s-2000s). At the same time, nuclear phase-out plan adopted by the Bundestag in 2011 definitely reflected on the prospects of further collaboration between Australia and Germany in this field. Here it should be noted that the 2011 Fukushima Dai-ichi nuclear power plant accident influenced the relations between the political powers of the countries: in Australia and Germany, the positions of the Green parties (that are affiliated with the Global Greens and interact within this network) strengthened substantially.

Finally, perhaps, one of the most fruitful and productive spheres of bilateral cooperation affected by nuclear factor is scientific and technological collaboration between

Australia and Germany. In a nutshell, it has to do with joint research & with development projects, the participation of research organisations and institutions, commercial companies and even individuals (scientists and experts). On the one hand, ANSTO (Australian Nuclear Science and Technology Organisation) is actively co-working with German scientists: for example, German physicists from Max Planck Institute for Chemistry (MPIC), Mainz, conduct their explorations at Australian research the reactor. Another case is as follows: German company Garching GmbH and ANSTO agreed on broad collaboration in the field of radioisotope development and production [5]. On the other hand, there is a close partnership between CERN (European Laboratory Particle Physics) and the specialists from Australia. These two organisations signed special a agreement regulating their cooperation. Quite recently, Australian educational institutions took part in International Masterclasses on particle physics,

together with German and other European organisations, CERN being one of them [2]. Earlier, in 2008, for European-Australian Forum Science and Technology cooperation issued a whole edition dedicated to the ofefforts Deutsche Forschungsgemeinschaft delegation in Australia and the establishment of the international ties and contacts between scientists and engineers from Australia and Germany [3].

both countries there In special bodies regulating the radiation **BfS** (Bundesamt safety: für Strahlenschutz, or Federal Office for Radiation Protection) in the Federal Republic of Germany and ARPANSA (Australian Radiation Protection and Nuclear Safety Agency) in the Commonwealth of Australia, exchange of professional skills and knowledge is held between the experts of these the international agencies at conferences and during official visits.

Scientific cooperation is also held in the form of exchange of the

expert commentaries and opinions on a wide range of questions, in particular, nuclear power and its pros and cons [6]. Curiously enough, Ziggy Switkowski, who was actually born in the post-war Germany, holds a PhD in (University Nuclear **Physics** of is Melbourne) and one the prominent Australian experts on nuclear energy.

To sum it up, international cooperation between the **Federal** of Republic Germany and the Commonwealth of Australia in the nuclear sphere was especially active in 1990s-2000s in the following directions: interaction within the international organisations on the legal issues of non-proliferation, peaceful use of nuclear power, export controls, radioactive materials management; exports of nuclear raw materials (triuranium octoxide) from Australia German nuclear power plant reactors; scientific and technological exchange between the organisations, companies and experts.

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