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## CONTEMPORARY INTERNATIONAL LEGAL REGIME GOVERNING NON-NAVIGATIONAL USE AND PROTECTION OF THE INDUS RIVER BASIN

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### SUMMARY

The author explored the international legal mechanisms to ensure cooperation between the states of the Indus river basin. The content of international treaties is reviewed, the practice of their application examined, the experience of functioning of the Permanent Indus Commission River analysed. In the conclusions, the author identifies the most important problems of international legal nature the basin states are facing now.

**Key words:** international river basin, Indus, international agreement, non-navigational use of transboundary freshwaters, protection of transboundary freshwaters.

## СОВРЕМЕННЫЙ МЕЖДУНАРОДНО-ПРАВОВОЙ РЕЖИМ НЕСУДОХОДНОГО ИСПОЛЬЗОВАНИЯ И ОХРАНЫ БАСЕЙНА РЕКИ ИНД

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### АННОТАЦИЯ

Автор исследует международно-правовые механизмы обеспечения сотрудничества государств бассейна реки Инд. Раскрыто содержание международных договоров, рассмотрена практика их применения, проанализирован опыт функционирования Постоянной комиссии реки Инд. В выводах автора выделяет важнейшие проблемы международно-правового характера, с которыми сейчас сталкиваются государства бассейна.

**Ключевые слова:** международный речной бассейн, Инд, международный договор, несудоходное использование трансграничных пресных вод, охрана трансграничных пресных вод.

**Problem statement, relevance of the topic, state of research, purpose and the task of the article.** The increasing topicality of non-navigational use and protection of the Indus river basin in times of water crisis and disputes between basin states gives rise to a need for the scientific analysis of contemporary international legal regime in the field. It is necessary to continue the research of such scholars as U. Alam, S. Barrett, S. Chandrasekharan, J. T. Newton, H. Sarfraz, G. Sen, A. Singh, A. T. Wolf.

**Essential material.** The Indus is located in Southern Asia. The basin of this large Trans-Himalayan river includes the territories of Pakistan, India, Afghanistan and China. The Indus is one of the longest years in the world, with a length of about 3200 km. Its total catchment area is about 1.165 million sq. km. [1].

Indus got the status of international river in 1947 after India and Pakistan gained independence from the United Kingdom.

The interstate boundary crossed the Indus basin and the best irrigated lands went into Pakistan. 10 of 13 channels of the Indus River system were directed to the latter, 2 to India, and one was divided between them. However, the sources of the river, and the main structures of the channels are located in India [2, p. 160].

In 1948, India changed the flow of rivers feeding Pakistani lands so that water no longer fell into Pakistan. Although eventually this decision was cancelled, later India declared its sovereignty over all waters passing through its territory [3; 4, p. 1]. In the end, a compromise was found in 1960, when two states concluded Indus Waters Treaty (IWT) dealing with non-navigable uses of the Indus river basin. The agreement mainly refers to the distribution of water to meet the interests of the parties, primarily in the field of irrigation. According to Art. II waters of the Eastern rivers of the basin (Sutlej, Biz and Rawi) are intended for the unlimited use by India.

Pakistan had undertaken to pass the waters of the main mouth of the Sutlej and Rawi rivers, when they flow through and cross its territory, with the exception of waters intended for domestic and non-domestic use. In doing so Pakistan should prevent the passage (with some exceptions) of tributaries connected with the main rivers to the point of their confluence, although the state may use tributaries coming from India and connecting with the main rivers downstream [5, p. 2].

According to the IWT, during the transition period, Pakistan should receive water from the Eastern rivers in the amount provided for in Appendix B to the Treaty. In art. III, para. 2 of the IWT it is stipulated that India is obliged to pass all waters of the Western rivers, i. e. Indus, Jhelum and Chenab, to Pakistan for domestic non-agricultural, agricultural and hydroelectric use, allowing water withdrawal only for domestic and some other purposes, in accordance with Annexes C and D to the Treaty.



In these rules, we see elements of such international legal principle as equitable and reasonable use of the water resources, but they are contained in the norms of Art. IV, which organically combine this principle with the no-harm rule. The former is addressed above all in Art. IV, para. 2 which provides that any non-consumptive use of water by one party shall be carried out in such a way that it doesn't result in material changes in any channel, to the detriment of its use by the other party in accordance with the provisions of the IWT.

The no-harm rule relates to four aspects: a) application of any flood protection or flood control scheme (Art. IV, para. 2); b) construction of drainage systems, soil conservation from erosion, dredging or removal of stones, gravel or sand from the river bottom (Art. IV, para. 3); c) management of water storage dams, troughs and irrigation channels (Art. IV, paras 6 and 9); d) the use of natural water channels for water discharging during floods or in other cases of excess water (Art. IV, para. 8) [5, p. 3, 6-9, 20-21].

Naturally, the utilisation of the Indus river basin is large-scaled. Therefore, it causes a number of threats to the ecosystem. Thus, the operation of irrigation canals, if not carefully controlled, may lead to serious damage to agricultural land. Given these factors, India and Pakistan have taken measures to create adequate drainage systems and thus avoid waterlogging and salt accumulation [1].

More than that, IWT contains rules on individual measures to prevent pollution, which are closely linked to the prohibition of harm. In art. IV, para 10 it is stated that each party declares its intention to prevent, as far as possible, excessive pollution of river waters, which may adversely affect their uses. India and Pakistan committed themselves to take reasonable measures to ensure that all industrial waters are treated before they are discharged into the river, so as not to harm its various uses [6, p. 209].

The IWT became the key element to guaranteeing regional security and economic development of Pakistan and India, promoted their awareness of common interests, established the basic principles and norms for future cooperation and the resolution of the most acute problems in the field of freshwater resources distribution.

In addition, two treaties were signed: on the Indus basin between Pakistan and the World Bank and on the Indus Basin Development Fund between India and Pakistan [7]. According to these agreements over the next decades states built a number of dams, barrages and connecting channels for redistribution of water [1]. Negative factor is that the Indus River Treaty allows parties to meet their individual interests, without joint management of transboundary freshwater objects. This leads to disputes regarding infrastructural projects. Besides, the IWT is not capable to promote adequate response to the changes of the Indus basin's natural characteristics, the growth of demand for water resources, caused by a significant increase in population, breach of treaty norms regarding water distribution, etc. In addition, the IWT does not meet the needs of Jammu and Kashmir, state of India, because the Treaty prohibits to build large dams or implement other energy projects [8].

On the basis of the above, we can state the need to bring the technical parameters of the IWT in line with contemporary requirements (i.e., the installation of a telemetry system which will allow Pakistan and India to measure the water level, without accusing each other of abstraction the volumes not provided for by the Treaty) [9]; to expand the scope of the IWT by incorporating in it the rules which would address the issue of ensuring the proper quality of water (it is threatened by toxic industrial waste), would respond effectively to the changes in economic conditions, problems of water shortage and need for new water storage facilities. Besides, the Treaty should contain effective and efficient procedures for groundwater management.

Another problem concerns the no-harm principle. IWT implies that if India or Pakistan plan to carry out any engineering works in the Indus basin which could cause interactions with the waters of any river, and, in the opinion of the state concerned, could cause material harm to the other party, the latter should inform the former of its plans and provide information about the essence, significance and impact of the work on the Indus river basin. This obligation refers to cases where the works may provoke interaction with the waters of any river, but they can't, in the opinion of the party planning them, cause material damage to the other party. In this case,

the state of origin should provide all useful information about the works to the other party at its request.

As we see, these rules are rather limited and don't oblige any party to stop planning or carrying out works in case of reasoned objections of another basin state. However the provisions of Art. IX allows for the termination of a project, one of the parties considers to be contrary to the IWT. In accordance with the procedure for settling disagreements and disputes, any issue arising in relations between the parties concerning the interpretation or application of the IWT or the existence of any fact that may give rise to a breach of the Treaty is first and foremost examined by the Permanent Indus Commission (PIC) – bilateral river commission consisting of reputable engineers appointed by India and Pakistan. If the Commission is not able to resolve the issue, IWT provides for the appointment of 'neutral expert', intermediaries and negotiators from the parties. Organization of an arbitration is also possible [10, p. 7].

The differences between the parties were mainly resolved within the framework of the Commission. However, sometimes there were more difficult disputes formally caused by different interpretation of the IWT by India and Pakistan, but de facto – by the struggle for water resources and aggravation of bilateral relations in general. Disputes related to India's projects, such as the Wullar Dam, Baglihar, Kishenganga, Neelum–Jhelum, Bursar barrages, and reservoirs for Western rivers' water storage; lack of water in Jammu and Kashmir; India's support for Afghanistan's construction of dams on the Kabul river – one of the tributaries of Indus [11, p. 416].

While under the IWT India is prohibited from building dams for water storage for further non-consumptive use, but has the right to limited water use, including flow-related hydropower projects on the Western rivers flowing through the territory of India. However Baglihar, Kishenganga, and Wullar projects, which fall into this category, met resistance from Pakistan as the latter interpreted the concept of 'water storage' narrowly [12].

In particular, the Baglihar project case refers to a 900 MW hydroelectric power station on the Chenab River in Jammu and Kashmir. Its construction began in 1999, the first stage was completed in 2004,



the second in 2008. In 2005, the World Bank qualified Pakistan's submission to the case as the 'controversy' – stage between 'question' and 'dispute'. Professor Lafitte, a Swiss civil engineer appointed as a neutral expert, in his 2007 decision declared that pondage capacity be reduced by 13.5%, height of dam structure be reduced by 1.5 meter and power intake tunnels be raised by 3 meters, thereby limiting some flow control capabilities of the earlier design. This somewhat limited India's ability to manage the water provided by the project. On the other hand, Lafitte rejected Pakistani claims over excessive Indian control over the water level on the Chenab River, and stated that this part of the project met engineering standards [13].

Another serious dispute concerns the part of India's scheme designed to divert waters from the Kishenganga river to a power station in the Jhelum river basin. Construction had begun in 2007 and should have been completed in 2016, but now the process delayed [14]. The Permanent Court of Arbitration in his final decision of December 2013 allowed India to continue construction of the Kishenganga power station and indicated that in order to preserve the environment a natural water flow of 9 cubic m/sec should be kept constantly in the lower part of the river. The Court stated that there was a need to use alternative technical methods for the Kishenganga hydroelectric plant and all future projects on the Western rivers of the Indus basin. However the problem has not yet been resolved, talks between the parties continue [15].

While addressing PIC's activities, we should note that the Commission consists of two 'Indus water commissioners' – one from India and Pakistan. Their functions are to establish and facilitate the work of cooperation mechanisms aimed at the implementation of the Treaty, to promote the rational use of water systems Indus [10, p. 6], to ensure the effective functioning of the Commission as a bilateral platform for monitoring the implementation of the IWT, the collection, exchange and processing of data relative to water use, to consider and resolve, by agreement, any issues that may arise between the parties to the IWT as to application or interpretation of the Treaty. For cases where members of the PIC are unable to

reach an agreement or decision-making is delayed for other reasons, the Treaty provides for a political compromise at the interstate level [16].

However, no infrastructural projects or water quality issues have yet been submitted to the Commission for consideration. Generally, PIC is not as effective as the 1960 Treaty stipulates, it works slowly and does not allow the parties to achieve their goals in context of continuously rising demand for water resources. Consequently, experts have comments on the level of competence of the commissioners and employees of the PIC; there is a need to strengthen the institutional capacity of this organization [17].

At the same time, the work of the Commission facilitated to some extent the implementation of the IWT rules in good faith, prevented armed conflicts over water resources [11; p. 14]. Most disagreements and disputes were settled due to the application of the legal procedures provided for by the IWT, some remain unresolved.

In recent times, Indo-Pakistan relations have been characterized by parties' claims against each other with respect to violation of their rights to water distribution and solutions that may have negative consequences for the Indus basin. These allegations are mainly attributable to the general tensions between the two states, but Pakistan as a downstream state has significant problems with the quantity and quality of freshwater resources, and depends heavily on India's actions. Indus irrigates about 110 thousand hectares of land in Pakistan and if India breaches the IWT, or even use the water of the Indus to the full extent provided for by the Treaty (about 20% of water of Western rivers), Pakistan will suffer from serious water shortages. Therefore, the latter objects to many Indian projects, their construction is postponed and India bears large losses [18]. However, irrational steps are taken by India itself, and they can have extremely negative practical impact for Indus basin. Following the 2016 terrorist attack in Kashmir, when 17 soldiers dead (India accused Pakistan of involvement in the attack) [19], India's prime minister N. Modi announced plans for a IWT that contravened its norms and provided for a suspension the PIC meetings, India's consideration of previously

suspended projects, and the creation of a corresponding interagency task force.

**Conclusions.** The Indus example demonstrates the importance of the responsibility of States towards their peoples when making decisions on transboundary freshwater. This will promote compromises that are needed first and foremost to meet the basic human needs. On the other hand, it's about threats to freshwater stemmed from the increasing water demand. This factor can lead to the breach of agreements – both individual and systemic, and even to the destruction of treaty regimes as such.

In our opinion, main problems of the international legal regulation of relations regarding the use and protection of the Indus river basin are the following: a) inappropriate management of transboundary freshwater resources, failure to take measures to protect them, leading to shortages and deterioration of water quality; b) dependence of the application of the international law in relations on the Indus river basin on the general relations between India and Pakistan; c) shortcomings of the IWT; d) inefficiency of the Indus River Commission and the lack of river basin management plans.

#### References:

1. Indus River. Encyclopædia Britannica Online. 2018. URL: <https://www.britannica.com/place/Indus-River>.
2. Гуреев С.А., Тарасова И.Н. Международное речное право. Юридическая литература. 2004. 352 с.
3. Barrett S. Conflict and Cooperation in Managing International Water Resources. The World Bank Policy Research Department: Public Economics Division. Working Paper 1303. 1994. 38 p.
4. Bakshi G., Trivedi S. The Indus Equation. Strategic Foresight Group, 2011. 43 p.
5. 1960 Indus Water Treaty. The World Bank. 1960. 22 p.
6. Sarfraz H. Revisiting the 1960 Indus Waters Treaty. Water International. 2013. Vol. 38, Issue 2: The 1997 UN Watercourses Convention – What Relevance in the 21st Century? Pp. 204-216.
7. Indus Basin Development Fund Agreement 1964. The World Bank. 1964. 7 p.