

# 5,4MW Hydro Power Plant HPP







## 5,4MW Hydro Power Plant HPP

The project involves the construction of a small hydro power plant (hereinafter referred to as "SHPP") with a capacity of 5.4 MW at a potential site located on the Talas River, Talas District, Talas Region. The topography of the terrain makes it possible to build the SHPP with an open-flow intake system.

The location of the SHPP was chosen given the highest slope with maximum development of the river hydroelectric potential.

The potential annual electric energy output is 36.8 million kWh.

Overview

The location of the intake has been chosen taking into consideration the topography.

of the terrain. The open-flow intake system will be 5.6 meters long. The total pressure will be 50 meters and the average slope of the pressure intake system will be 8.9 meters per kilometer.

The preliminary total area of land plot allocated for the construction of the main structures of the SHPP is 20.2.

hectares, including water intake (6.3 ha), diversion canal (11.0 ha), power house and appurtenant structures (2.9 ha).

The location of the SHPP was chosen given the highest slope with maximum.

development of the river hydroelectric potential. Access roads to the water intake on the right shore – there is a field road along the diversion canal, to the station building on the left shore.

Keypoints

Nearby 110/35/10 kV Chat Bazaar substation. The capacity of substation is 25,000 kVA. The aerial line to connect to the Chat Bazaar substation is 7.3 km long. The nearby 8,000 kVA 35/10 kV Kyrk-Kazyk substation. Taking into account the potential capacity of the SHPP and the distance from the SHPP to the substation, the construction of a 35 kV aerial line and a 35 kV step-up substation is necessary. According to Google Maps, the length of the 35 kV aerial line connecting the Small HPP switchyard with the "Chat Bazaar" substation will be 2.7 km.

Advantageous location of the facility. The location of the HPP was chosen taking into account the highest slope with maximum development of hydroelectric potential of the river. Access roads to the water intake on the right shore – there is a field road along the diversion canal, to the station building on the left shore.

The topography of the terrain makes possible the construction of an HPP with an open-flow intake system, which reduces the project cost.

High hydroelectric potential. The hydroelectric potential of the country is 142 billion kWh. The Kyrgyz Republic ranks third in the CIS in terms of the HPP and SHPP capacity.

Page 1 of 2

TARGET PRICE \$8.990.000

GROSS REVENUE

\$0

EBITDA

\$0

BUSINESS TYPE Renewable Energy

COUNTRY Kyrgyzstan

BUSINESS ID L#20240646

Low development of the potential. As of 2021, the utilization rate is 10% of the total hydroelectric potential of the country.

High capacity of HPP cascades. According to experts, the total capacity of prospective HPP cascades is 5,600 billion kWh.

CASA-1000. The Kyrgyz Republic is a member of the CASA-1000 project aimed at creating a power line linking Central and South Asia.

### Status

Ready to Build (RTB)

### Financials

Project cost - \$8,375,960

- Hydraulic structure \$3,327,333
- Hydromechanical structure \$2,740,000
- Electrical structure \$1,280,000
- Unforeseen expenses \$587,787
- Administrative expenses \$440,840

Amount of investments – \$8,375,960 Payback period – 6.35 years

Capacity	5.4 MW			
Output	36.75 million kWh			
Investments	USD 8.37 million			

\*\*According to the legislation of the Kyrgyz Republic, the project may be subject to a preferential tariff with application of a coefficient of 1.3 for small HPPs for a period not exceeding 10 years.

		1	2	3	4	5	6	7	8	9	10
Output	million kWh	36,75	36,75	36,75	36,75	36,75	36,75	36,75	36,75	36,75	36,75
Tariff	USD/kWh	0.0386	0.0386	0.0386	0.0386	0.0386	0.0386	0.0386	0.0386	0.0386	0.0386
Revenue	thousand USD	1 418,7	1 418,7	1 418,7	1 418,7	1 418,7	1 418,7	1 418,7	1 418,7	1 418,7	1 418,7
EBITDA	thousand USD	1 318,2	1 318,2	1 318,2	1 318,2	1 318,2	1 318,2	1 318,2	1 318,2	1 318,2	1 318,2

- ✓ IRR at the end of Year 10 is 9.23%
- ✓ Project payback period is 6.35 years, discounted payback period is 9.05 years

# SOURCES OF FINANCING AND APPLICATION OF FUNDS

Source of financing	Amount, USD				
Financial investor	8 375 960				
Total:	8 375 960				
Application of funds	Amount, USD				
Hydraulic structure	3 327 333				
Hydromechanical structure	2 740 000				
Electrical equipment	1 280 000				
Unforeseen expenses	587 787				
Administrative expenses	440 840				
Total:	8 375 960				



The information contained herein does not constitute an offer to sell or a solicitation of an offer or a recommendation to purchase securities under the securities laws of any jurisdiction, including the United States Securities Act of 1933, as amended, or any US state securities laws, or a solicitation to enter into any other transaction

The projected financial information contained in the Memorandum is based on judgmental estimates and assumptions made by the management of the target Company, about circumstances and events that have not yet taken place. Accordingly, there can be no assurance that the projected results will be attained. In particular, but without prejudice to the generality of the foregoing, no representation or warranty whatsoever is given in relation to the reasonableness or achievability of the projections contained in the Memorandum or in relation to the bases and assumptions underlying such projections and you must satisfy yourself in relation to the reasonableness, achievability and accuracy thereof.

By delivering this Memorandum, neither MergersUS Inc., nor its authorized agents are making any recommendations regarding the acquisition or strategies outlined herein. Interested parties shall exercise independent judgment in, and have sole responsibility for, determining whether an acquisition of the Company is suitable for them, and neither MergersUS Inc, nor its authorized agents have responsibility to, and will not, monitor the condition of interested parties to determine that an acquisition is or remains suitable for them. Among other things, suitability of an acquisition will depend upon an interested party's investment and business plans and financial situation.

This document is prepared for information purposes only. It is made available on the express understanding that it will be used for the sole purpose of assisting the recipients to decide whether they wish to proceed with a further investigation of the Proposed Transaction.

The recipients realize and agree that this document is not intended to form the basis of any investment decision or any other appraisal or decision regarding the Proposed Transaction, and does not constitute the basis for the contract which may be concluded in relation to the Proposed Transaction.

All information contained in this document may subsequently be updated and adjusted. MergersUS Inc. has not independently verified any of the information contained herein or on which this document is based. Neither the Company, nor its management or shareholders, nor MergersUS Inc., nor any of their respective directors, partners, officers, employees or affiliates make any representation or warranty (express or implied) or accept or will accept any responsibility or liability regarding or in relation to the accuracy or completeness of the information contained in this document or any other written or oral information made available to any interested party or its advisers. Any liability in respect of any such information or any inaccuracy in or omission from the document is expressly disclaimed.

www.mergerscorp.com



© 2024 MergersCorp M&A International. All rights reserved.

© 2024 MergersCorp M&A International. MergersCorp™ M&A International is the collective brand name of independent affiliates of MergersCorp M&A International. For more details on the nature of our affiliation, please visit us on our website https://www.mergerscorp.com/disclaimer. MergersCorp M&A International is not a registered broker-dealer under the U.S. securities laws. MergersCorp M&A International does not offer or sell securities or provide investment advice or underwriting services. The articles or publications contained in this presentation are not intended to provide specific business or investment advice. The author or MergersCorp M&A International shall not be liable for any errors or omissions, or for any loss suffered by any person or organization acting or refraining from acting as a result of the content of this website. It is recommended that specific independent advice be sought before making any business or investment decision.

