Bidding for Research on Key Technologies for Medium and Deep Geothermal Utilization and

Support at the Zero-carbon Airport under Taiyuan Wusu Zero-carbon Airport Project financed by

NDB Loan

(Bid No.: 0773-2540GNOEFWGK1049)

Project Location: Taiyuan, Shanxi Province

I. Conditions for Bidding

This project is the Research on Key Technologies for Medium and Deep Geothermal Utilization and

Support at the Zero-carbon Airport under Taiyuan Wusu Zero-carbon Airport Project financed by NDB

Loan (Project No.: M1401000155900185008, NDB Contract No.: TY-S-014). The project funding

comprises New Development Bank loan and self-raised funds from the enterprise, and the Client is Shanxi

Aviation Industry New Energy Co., Ltd. The Project is now ready for bidding and is hereby open for public

bidding.

II. Project Overview and Scope of Bidding

Project overview: Located within the Taiyuan Wusu International Airport, the Project is aimed and tasked

to achieve zero-carbon operation for building structures, equipment and facilities owned by Shanxi

Aviation Industry Group Co., Ltd. within the territory of Taiyuan Wusu Airport. Construction Content: The

Taiyuan Wusu Zero-carbon Airport Project consists of 6 subprojects, namely: (1) Zero-carbon cooling and

heating engineering; (2) Zero-carbon power engineering; (3) PSDF (charging) building demonstration and

upgrade engineering in the terminal area; (4) Near-zero carbon building pilot engineering; (5) Solar-powered

low-carbon street lamp; (6) Flexible resource data management platform for virtual power plant and

photovoltaic-storage applications.

Content of bidding: This bidding is the Research on Key Technologies for Medium and Deep Geothermal

Utilization and Support at the Zero-carbon Airport under Taiyuan Wusu Zero-carbon Airport Project

financed by NDB Loan

Scope of bidding: In accordance with the directives and requirements of the Central Government, the

Provincial Party Committee, the Provincial Government and Taiyuan Municipal Government regarding the

dual-control and dual-carbon emission reduction targets, as well as the Notice on the Comprehensive

Promotion of Geothermal Energy Application in Public Buildings (Jin Fa Gai Neng Yuan Fa [2022] No.

165) jointly issued by four provincial departments including the Shanxi Development and Reform

Commission, the work will, relying on the Taiyuan Wusu International Airport Phase III Reconstruction

and Expansion Project, make full use of the abundant hydrothermal geothermal resources stored in the

deep karst strata in the area where Wusu International Airport is located to obtain a substantial amount of

renewable energy and meet the majority of energy demands for airport's heating, thereby establishing a

zero-carbon renewal demonstration project. While ensuring the safe operation of the airport, this effort will

advance green and sustainable development of the airport. In addition, in order to guarantee the long-term stability and efficient operation of the medium and deep geothermal system, specialized research will be conducted on the heat generation mechanism of medium and deep geothermal resources, the stability of hydrothermal exploitation, and the optimal control of the operation mode to plan the utilization mode of the medium and deep geothermal well cluster, and further ensure the safety of the application of the medium and deep geothermal utilization and guarantee project in the airport. For detailed information, please refer to Section 5: "Requirements for Work Content."

III. Bidders' Eligibilities

The following eligibility requirements of bidding apply to bidders from all member countries of the NDB. For China specific eligibilities, the bidders from NDB other member countries shall be equipped with equivalent ones.

- 1. Qualification requirements: The registration place of the bidder shall be from the member countries of NDB, and the bidder shall have a valid business license or provide relevant certificates and qualifications equivalent to the business license;
- 2. Credit requirements: The bidder shall not be included in the list of untrustworthy enterprises with serious violations or abnormal business operations of the "National Enterprise Credit Information Publicity System", nor be included in the list of judgment defaulters on the "Credit China" website;
- 3. Qualifications requirements for the project leader: The project leader shall hold a master's degree or higher, with a senior engineer title or associate professor or associate researcher title or above in the related fields of Geology, Hydrogeology, or Engineering Geology;
- 4. Performance requirements: In the past eight years (from January 1, 2017 to bid submission deadline), the bidder shall have at least one research project related to karst hydrogeology or geothermal hydrogeology;

5. Other requirements:

- (1) Different units with the same person in charge or different units with controlling or management relationship shall not bid for this project at the same time, otherwise the relevant bids are invalid;
- (2) The bidder shall have not been restricted from bidding by the governments of the member countries of NDB. (The bidder shall provide a letter of commitment that has not been restricted from bidding by the governments of the member countries of NDB in the format required by the bidding documents.)
- 6. Bids from joint venture will be accepted; If the bidding is in the form of a joint venture, the following requirements shall be met:
- (1) The bids submitted by a bidder and the contract agreement signed after being awarded the contract shall

be legally binding on all members of the Joint Venture;

(2) The members of the Joint Venture shall sign a Joint Venture Agreement to stipulate their respective

work and responsibilities and submit this Joint Venture Agreement along with the bids to the Client;

(3) Each member of the Joint Venture shall not submit a separate bid in its own name, nor participate in

two or more Joint Venture bids simultaneously. In either case, the bids submitted in its own name and the

bids of the Joint Venture to which it belongs will both be rejected;

(4) If the Joint Venture wins the bid, the members of the Joint Venture shall jointly sign the contract with

the Client and bear joint and several liabilities to the Client for contract performance;

(5) The members of the Joint Venture shall jointly nominate a Joint Venture leader and submit a power of

attorney to prove such Joint Venture leader's authority. This power of attorney shall be submitted to the

Client as part of the bids.

IV. Acquisition of Bidding Documents

Acquisition Time: From 14:00 on May 26, 2025 to 17:00 on June 03, 2025

Acquisition Method: Online through the Yangguang Procurement Platform of Shanxi Aviation Industry

Group (http://aviagroup.jcebid.com). Bidding documents are priced at CNY 500, non-refundable after sale.

Bank Account Information:

Name: China Capital Tendering Co., Ltd.

Deposit bank: China Merchants Bank, Beijing Haidian Science and Technology Finance Sub-branch

Account: 8670 8011 2810 001

V. Submission of bids

Deadline for Submission: 14:00 on June 18, 2025

Submission Method: Online Submission

Place for Submission: Yangguang Procurement Platform of Shanxi Aviation Industry Group

(http://aviagroup.jcebid.com)

VI. Time and Venue for Bid Opening

Bid Opening Time: 14:00 on June 18, 2025

Bid Opening Method: Online bid opening through the Yangguang Procurement Platform of Shanxi

Aviation Industry Group (http://aviagroup.jcebid.com)

VII. Other Public Announcements

The Notice will be released simultaneously on NDB website (https://www.ndb.int), China Tendering And

Bidding Public Service Platform (http://cebpubservice.cn), Shanxi Provincial Tendering and Bidding

Association/Shanxi Tendering and Procurement Service Platform (https://sxtba.com), Yangguang

Procurement Platform of Shanxi Aviation Industry Group (http://aviagroup.jcebid.com) and website of

Shanxi Aviation Industry Group Co., Ltd. (http://www.sxairport.org.cn/)

Note: 1. All interested bidders shall register at the column of "Trading Market Entity Database" of

http://prec.sxzwfw.gov.cn (National Public Resource Trading Platform (Shanxi), and the registration guide

is available at: http://jyzt.sxzwfw.gov.cn/ztxxzc/index.jhtml.

2. If you need to apply for a CA digital certificate, please check the column of "digital certificate cross

mutual recognition" (http://prec.sxzwfw.gov.cn/cajchrpt/) of National Public Resource Trading Platform

(Shanxi) (http://prec.sxzwfw.gov.cn/). Customer service hotline for Yangguang Procurement Platform of

Shanxi Aviation Industry Group: 400-0351-097 (working hours: 9:00-12:00, 13:30-17:30).

VIII. Supervision Department

The supervisory department of this bidding project is: Shanxi Aviation Industry New Energy Co., Ltd.

Comprehensive Office

IX. Contact Information

Client: Shanxi Aviation Industry New Energy Co., Ltd.

Address: No. 199, Taiyu Road, Xiaodian Street, Xiaodian District, Taiyuan City, Shanxi Province, China

Persons of Contact: Jianping Liu

Tel No.: 0351-7286345

Procurement Agency: China Capital Tendering Co., Ltd.

Address: Floor 15, Jiuling Plaza, No.21 Xisanhuan Bei Road, Haidian District, Beijing City, China

Persons of Contact: Ping He

Tel No.: 010-68405052, 15210867621

Email: cctc2009@163.com