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| <b>Project Title</b>        | Assistance to Finalize the Bidding Documents for the Upgrade of the National Load Dispatch Center of Vietnam Electricity  |
| <b>Contracting Agency</b>   | National Load Dispatch Center (NLDC) of Vietnam Electricity (EVN) with funding from the Asian Development Bank (ADB)  |
| <b>Project Organization</b> | Prime Contractor: Savu C. Savulescu from Energy Consulting International, Inc. as an Independent Consultant, with full responsibility for all the technical and project management aspects of the project   |
| <b>Summary</b>              | The consulting services provided to NLDC as part of this project were provided under the Northern Power Transmission ADB Loan No. 2128 and encompassed the review and finalization of the bidding documents for supplying, installing and testing for RTUs, Substation Automation Systems and communication facilities links  |
| <b>Background</b>           | <p>In recent years, EVN has conducted several SCADA/EMS projects aimed at implementing modern real-time and off-line information systems at the NLDC and the Northern, Central and Southern Regional Load Dispatch Centers. At the time when these projects were initiated, EVN specified advanced designs based on then, modern, state-of-the-art computers, communications and related software. For a variety of reasons, however, the end result of this significant effort did not meet EVN's original expectations and all these systems will have to be replaced, most probably between 2011 and 2014. In the mean time, EVN received a loan from ADB for strengthening the Northern Transmission Network. Since, on the other hand, the performance of the existing SCADA systems needs to be improved <i>before</i> the new systems will be installed, NLDC is using part of this loan to upgrade and expand SCADA system through the provision of Remote Terminal Units (RTUs) for substations and power plants, software and hardware upgrades to national and regional load dispatch centers, and communications facilities linking three regional load dispatch centers (north, central, and south) and the NLDC in Hanoi with the RTUs in substations and power stations. NLDC is the Executing Agency of this undertaking and has contracted Savu C. Savulescu to assist in reviewing and finalizing the bidding documents that were drafted, on a preliminary basis, by NLDC personnel.</p> |
| <b>Objectives</b>           | <ul style="list-style-type: none"><li>▪ Assist NLDC in preparing bidding documents for supplying, installing and testing for RTUs and communication facilities links</li><li>▪ Propose a methodology for implementing limited software and hardware upgrades at the SCADA/EMS currently existing at the national and regional load dispatch centers</li></ul>   |
| <b>Scope of Work</b>        | <ul style="list-style-type: none"><li>▪ Task 1: review current draft of the Bidding Document (BD), check its conformity with ADB's standards and requirements for international competitive bidding and make necessary amendments</li><li>▪ Task 2: review and appraise the Evaluation and Qualification Criteria for adequacy, comprehensiveness and make necessary amendments so that NLDC can evaluate the bids and post-qualify the lowest evaluated bidder</li></ul>   |

- Task 3: perform a detailed assessment of the Employer's Requirement in Bidding Document and make necessary amendments to undertake that: the schedule of supply is so complete, precise, and clear that unnecessary clarifications can be avoided; sufficient information is provided to bidders to enable them to efficiently and accurately prepare bids that are realistic and competitive; reasonable competition is possible while at the same time reinforcing clear specifications for the required standards of workmanship, characteristics of materials, performance of the RTUs, communication equipment, related facilities and installation work; the procurement and installation work could be well supervised by NLDC; the supplied RTUs and related facilities are manufactured based on modern technologies that ensure flexibility in integration and effectiveness in operation with NLDC's SCADA/EMS systems
- Task 4: work with NLDC in Hanoi, Vietnam to: present comments and amendments; review and revise additional EVN and/or ADB requirements; assemble the BD which will be subject to final approval

**Period of  
Performance** May – October, 2007