Charles Janecek

Mr. Janecek provides a unique blend of commercial consulting and utility planning experience to PA's clients. He has 20 years of experience in the electric power industry through previous positions with an investor-owned utility (IOU) and private consulting firms. As a senior planner with an IOU, he was integral to the process of soliciting, evaluating, and procuring more than 2 GW of generating resource additions to the IOU system, including over 750 MW of wind generation and 80 MW of solar resources. At PA, Mr. Janecek has focused on independent evaluations of utility power purchase contracts as well as utility owned resources. When advising clients involved in wholesale markets and asset transactions, Mr. Janecek applies experience gained analyzing and facilitating transactions for more than 500 assets. He has modeled every area of the U.S. and Canada, along with many individual control areas within the markets, to support asset valuations, strategic planning initiatives, regulatory proceedings, and litigation proceedings.

Primary expertise	Related experience	Qualifications	Client list
• Resource procurement and solicitation evaluations • Integrated resource planning • Power market economics and operations • Utility operations • Valuation of physical and financial assets	• Gas, power, and coal market dynamics • Litigation support and expert testimony drafting • Contract negotiations	• B.S. Geology	• Electric utilities such as Xcel Energy, City of Burbank Water and Power, Santee Cooper, Anaheim Public Utilities, Virgin Islands Water and Power Authority

Primary expertise

Resource Procurement and Solicitation Evaluations – Charles has led multiple independent evaluation engagements, including RFP drafting and marketing, bid due diligence and economic/technical evaluations, procurement audits, and regulatory compliance filings.

Integrated Resource Planning – Charles has led several integrated resource planning assignments. The assignments have ranged from detailed scenario planning, fundamental and stochastic-based production cost modelling, dynamic capacity expansion optimization, management and regulatory presentations, and stakeholder engagement support.

Power Market Economics and Operations – Charles has analyzed and facilitated transactions for more than 500 assets. He has modeled every area of the U.S. and Canada, along with many individual control areas within the markets, to support asset valuations, strategic planning initiatives, regulatory proceedings, and litigation proceedings.

Utility Operations – Over the course of his career, Charles has been intimately involved with advising utilities on a wide range of utility operations. He has led solar and wind generation integration analyses, evaluating the impact these intermittent resources have on the operations and dispatch of the balance of system resources. Charles has evaluated the operations of pumped storage hydro resources for their ability to provide ancillary services to a given utility's system as well as the wider markets.

Valuation of Physical and Financial Assets – Charles has conducted detailed dispatch projection analyses for assets located in regional transmission organizations and power markets, as well as bilateral, utility-based markets. He has analyzed hydroelectric, pumped storage, wind, biomass, geothermal, battery storage, hybrid solar-thermal, cogeneration, nuclear, coal, and natural gas as well as power and fuel contracts, financial hedges, and trading books.

Key client achievements

U.S. Investor Owned Utility – Mr. Janecek led several engagements with a Midwestern utility to provide independent evaluator and auditing services. As independent evaluator, Mr. Janecek led analyses to independently verify financial and production cost modelling conducted to support utility self-build projects as well as independent power producer bids. As independent auditor, Mr. Janecek led efforts to audit competitive procurement solicitations, including bidder communications monitoring, bid due diligence efforts, analysis review, and contract negotiations monitoring.

Western U.S. Investor Owned Utilities – At PA, Mr. Janecek is an integral member of the PA team currently supporting two major western US IOUs in their competitive procurement process. PA provides independent evaluator services to both utilities, which requires the submittal of independent evaluators' reports to regulatory commissions certifying the fairness and equitable treatment of all bidders. These independent evaluation services require communications and contract negotiations monitoring, bids and analysis review, and regulatory reporting.

City of Burbank Water and Power – Mr. Janecek led the effort with BWP to quantify the uncertainties BWP faces as it considers the pending shutdown of the Intermountain Power Project. He guided BWP in developing portfolio scenarios for evaluation, then conducting stochastic production cost modeling to quantify the impacts that various resources will have on BWP and its ratepayers. BWP's IRP evaluated a compressed air energy storage (CAES) facility as a potential source of ancillary services for BWP, and Mr. Janecek provided analytical support for that evaluation as well.

Caribbean Island Utility – Mr. Janecek led the development of a comprehensive integrated resource plan for this island utility. A key component of the IRP was the development and production cost modeling of various resource portfolio scenarios. He collaborated with the client to utilize a structured framework for the development of those scenarios, providing a defensible and comprehensive approach toward defining the possible paths for the utility. He then performed production cost modeling to quantify the scenarios including analysis of the system energy and demand requirements, conservation and energy efficiency opportunities, potential fuel infrastructure requirements related to liquefied natural gas and potentially liquid petroleum gas (propane), projected penetrations of distributed solar generation, potential new supply construction of thermal and renewable resources, and potential impacts to the utility's transmission and distribution systems and associated upgrade requirements.

Midwest IOU – Mr. Janecek led several wind integration efforts, working with the IOU's Energy Supply, Commercial Operations, and Resource Planning groups. He performed specialized modeling analyses to quantify the costs for procuring and dispatching intermittent wind resources. He helped design a state-of-the-art wind generation forecasting system in coordination with the National Renewable Energy Laboratory and National Center for Atmospheric Research.

Additionally, Mr. Janecek conducted a multi-year study to identify expected O&M costs related to extensive cycling of coal-fired plants due to wind generation. The study quantified the number of significant ramping events for each coal-fired plant on the system and then applied a cost per cycle to estimate annual cycling costs. These costs were compared to the estimated costs of curtailing the expected wind generation in place of ramping down the coal units.

Commonwealth Utilities Company (CUC), Saipan. Mr. Janecek managed the development of a new 20-year IRP covering 2015–2038. He worked with CUC system planners to create an energy supply RFP targeted at new supply construction vendors, seeking proposals for new supply options on Saipan. Upon receipt of those proposals, he worked with CUC to evaluate and shortlist the proposals for consideration in the IRP. The engagement also involved working with CUC throughout its stakeholder engagement process to identify community concerns relative to the IRP development and ensure that ultimately the IRP reflected those concerns.

A primary task in this IRP engagement was to parameterize and model each of CUC's generating units and power purchase contracts, as well as other system-level inputs. Production cost modeling was run for a base case model of the CUC system, as well as stochastic scenario modeling (20-year forecasts describing the range of expected values for fuel, fixed operations and maintenance (O&M), and variable O&M). Parameters of various demand-side management measures and demand response programs were evaluated in the scenario modeling.