# IESO Corporate Performance Quarterly Results

To the end of September 30, 2011

## A. Reliability (30%) - *"To sustain excellence in delivering reliable electricity service conditioned by costs and environmental performance."*

| Legend |
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| On track |
| On watch |
| At risk |
| No data |

| A1 | |
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| **Performance Objective** | The IESO-controlled grid provides reliable electricity service. |
| **Measure A1.1** | Ontario's annual unsupplied energy is within acceptable limits. |
| **Target(s)** | Ontario's annual system unsupplied energy meets the published Ontario benchmark (15.75 system minutes) and the IESO agrees to a mitigation plan with relevant external parties designed to improve performance for any local area with unsupplied energy above threshold. |
| **Q3 Result** | Ontario's annual system unsupplied energy is at 9.45 minutes, which is tracking under the published Ontario benchmark. There were three red flagged local areas identified during the quarter for which mitigation plans have been implemented by transmitters. |

| A2 | |
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| **Performance Objective** | The IESO's actions support reliable operation of the IESO-controlled grid. |
| **Measure A2.1** | Compliance by the IESO and market participants with applicable reliability standards, market rules and regulatory requirements. |
| **Target(s)** | • The IESO reports full compliance with NERC high violation risk factor (VRF) requirements that are within the IESO's control and no violations of NPCC sanctionable criteria that are greater than Level 2 and that are within IESO's control;<br>• 90% of market participants who have high VRF requirements reported full compliance with their high VRF requirements and no NPCC sanctionable criteria greater than level 2; and<br>• NPCC audits find the IESO compliant with all High VRF requirements included in the audited NERC standards. |
| **Q3 Result** | • The IESO reports full compliance with NERC high violation risk factor (VRF) requirements that are within the IESO's control and no violations of NPCC sanctionable criteria that are greater than Level 2 and that are within the IESO's control;<br>• More than 90% of market participants with high VRF requirements reported full compliance with their high VRF requirements and there were no reported violations of greater than Level 2 NPCC sanctionable criteria; and<br>• The final report submitted by the NPCC Audit team found the IESO to be compliant with all High VRF requirements in the non-CIP portion of the recent NPCC audit of NERC standards. |

| A3 | |
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| **Performance Objective** | The IESO-controlled grid is equipped to provide reliable electricity service going forward. |
| **Measure A3.1** | Plans are in place to ensure timely identification and resolution of potential operability issues. |
| **Target(s)** | • Energy modelling – By the end of 2011, energy adequacy will be addressed for 2012 and 2013, and a business case will be approved for an ongoing energy modelling capability.<br>• Renewables integration – Key elements of the Renewable Integration Initiative (Variable Generation Forecasting, Real-Time Integration, Operations Planning, and Control Room Monitoring) will proceed as per the defined schedule (currently under development).<br>• In the event that IESO reliability assessments identify power system inadequacies (generation, transmission or load) which could adversely affect future reliability, explicit activities to influence remediation of these issues are developed and communicated to the responsible parties. |
| **Q3 Result** | • Energy Modeling – Evaluations have been completed and a business case for energy modeling capability was approved well in advance of the targeted timelines.<br><br>As part of a separate operations, maintenance and administration (OM&A) project, a preliminary assessment of energy adequacy for 2012 and 2013 has been completed. The corresponding findings will be finalized within the targeted timelines.<br><br>• Renewable Integration Initiative (RII) – High level design is complete and is expected to guide the ongoing efforts of the RII initiative through the work on forecasting, visibility and dispatch elements. The IESO continues to work through some of the technical needs of the centralized wind forecast vendor. The Market Rules obligating variable generators to submit static and dynamic data for the purposes of centralized forecasting will come into effect November 1st and an outreach program to facilitate the timely acquisition of this information is ongoing for both transmitter and distributor connected facilities.<br><br>The Dispatch Technical Working Group (DTWG) and the Floor Price Focus Group will commence soon with their first meeting scheduled for November 7th and November 21st.<br><br>• The IESO clarified the market rule requirements for reactive power compensation and controls for renewable generation to allow more flexibility in implementation. |

## B. Customers and Stakeholders (25%) - *"To continue to operate and adapt the IESO administered electricity markets to the benefit of all Ontarians."*

| B1 | |
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| **Performance Objective** | Suppliers and consumers are responsive to the price of electricity. |
| **Measure B1.1** | Suppliers and consumers are increasingly exposed to prices and rates raising their awareness and ability to make appropriate decisions regarding their offers and consumption of electricity. |
| **Target(s)** | • The Global Adjustment (GA) education and outreach program is delivered to 75% of eligible large volume consumers within six months of the issuance of the GA allocation regulation.<br>• The Enhanced Day Ahead Market (EDAC) is:<br>o Delivered on time as per its project schedule;<br>o Integrated into existing processes seamlessly;<br>o Market participants express satisfaction with its market trials; and<br>o EDAC achieves its stated objectives and operates as intended.<br>• Time-of-use rollout:<br>o The IESO proactively engages LDCs to move forward with their TOU plans;<br>o Neither the IESO nor its services offer any barriers to LDC plans; and<br>o The total number of consumers billed on TOU rates at the end of 2011 will be 4 million. |
| **Q3 Result** | • The GA education outreach program has been delivered to 90% of large volume consumers.<br><br>• **EDAC:**<br>o At the end of Q3, EDAC was expected to be delivered on time as per its project schedule.<br>o New, existing and modified systems and processes are ready to operate in an integrated fashion at deployment.<br>o Market participants carried out Market Trials testing from June 2011 to mid September 2011, including an integrated Settlements test environment.<br>o **Please note:** due to the timing of publishing this quarterly report, EDAC was successfully delivered on October 12, 2011 on time as per its project schedule.<br><br>• **Time-of-use rollout:**<br>o The IESO is actively engaged with the distributors to facilitate their enrolment process and to help them meet their mandated TOU dates. The IESO continues to adjust its training and workshop session offerings to meet the needs of the LDCs. Training sessions on the use of the MDM/R's graphical user interface (GUI) are conducted both on-site at our facilities and at LDC facilities (see: www.smi-ieso.ca/training for details).<br>o By the end of September, 59 LDCs representing 4.3 million Regulated Price Plan eligible customers were integrated with the MDMR and 3.8 million smart meters were enrolled with the MDM/R. Two LDCs were scheduled to begin cut-over to the MDM/R, and 10 LDCs were in enrolment and unit testing with the MDM/R.<br>o With most of the remaining non-production distributors in various stages of preparations to integrate with the MDM/R, the IESO is confident that the IESO can continue to provide support to LDCs in all stages of enrolment testing.<br>o The IESO continues to be effective in supporting distributor enrolment and the implementation of time-of-use billing under the Ontario Energy Board's TOU mandate. IESO smart metering service level reports indicate positive performance and that the IESO is not a barrier to the implementation of LDC plans. The Meter Data Management and Repository (MDM/R) system is actively processing smart meter data from over 3.1 million meters on a daily basis and producing time-of-use (TOU) billing quantities for customer invoices.<br>o The IESO remains confident that with ongoing tuning and collaborative support of LDCs, |

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| | that the MDM/R will continue to offer a stable system and support LDCs time-of-use implementation plans and ramp up of meters to full provincial volumes.<br>o Over 3.2 million customers were on time-of-use billing at the end of September 2011. |

| **B2** | |
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| **Performance Objective** | Market Participants are satisfied with the IESO's administration of the electricity market. |
| **Measure B2.1** | Customer satisfaction with the IESO's administration of the market. |
| **Target(s)** | In the annual survey, customers provide an average rating of 7.5 on their satisfaction with the IESO's administration of the market. |
| **Q3 Result** | • Annual survey results to be available in Q4, 2011 |

| **B3** | |
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| **Performance Objective** | The IESO administered market promotes the purposes of the Green Energy and Green Economy Act (GEGEA). |
| **Measure B3.1** | IESO actions adapt to support the objectives of the GEGEA and the obligations prescribed within its regulations. |
| **Target(s)** | • Connection assessments related to renewable energy generation projects, shall be completed within 150 days; and<br>• A dispatch priority policy is implemented by Q2 2011. |
| **Q3 Result** | • All connection assessments related to renewable energy generation projects have been completed within 150 days. |
| | • The design principles for the dispatch priority policy have been finalized and adopted. The RII team is continuing its work on the implementation of the policy through the Floor Price Focus Group (formerly named the Dispatch Merit Order Working Group). |

## C. Operational Effectiveness (20%) - *"To provide excellent products and services in an efficient and effective manner that meets the needs of customers."*

| C1 | |
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| **Performance Objective** | The IESO's infrastructure is capable of meeting the needs of customers in the future. |
| **Measure C1.1** | IESO successfully undertakes and completes change initiatives. |
| **Target(s)** | Achievements of projects are ranked through the project portfolio management (PPM) process:<br>• 100% of the approved regulatory projects are initiated and completed as proposed and meet, or are progressing according to project plan to meet, the regulatory requirement;<br>• Refresh projects are initiated and completed according to the refresh life cycle requirements; and<br>• The top 5 discretionary projects, including any existing "key capital projects", are completed as per their approved business case. |
| **Q3 Result** | Projects are on track to meet their specified requirements. |

| C2 | |
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| **Performance Objective** | The IESO's human resources are capable of meeting the needs of customers in the future. |
| **Measure C2.1** | The training and development of the IESO's human resources. |
| **Target(s)** | Management shall define and implement a corporate wide strategy for training and development, and will establish a methodology to track staff training and development within all business areas by the end of 2011. |
| **Q3 Result** | Material in support of corporate Human Resources strategy is being developed and on track to meet the defined target. |

| C3 | |
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| **Performance Objective** | IESO resources are used effectively and efficiently to meet the needs of customers and achieve stakeholder satisfaction. |
| **Measure C3.1** | Delivery on the business plan both capital and OM&A. |
| **Target(s)** | • The IESO operates at no operation deficit; and<br>• Demonstration of improved efficiency while delivering and meeting all the obligations outlined in the business plan. Business units will establish the current cost of delivering identified overhead and commodity transactions and demonstrate a 3% reduction in total for the specified areas by the end of 2011. It is expected that in total, the baseline work would cover over 50% of the IESO's operational workload. |
| **Q3 Result** | • IESO's operating surplus to the end of the third quarter was $6.8 million. |
| | • Management is using readily available data as proxy information to demonstrate improved efficiency; as the proxy information becomes sufficiently informative it will be validated and reviewed. |

## D. Reputation and Relationships (25%) - *"To advance the IESO's reputation and relationships to further engage the electricity sector and accomplish its mission."*

| D1 | |
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| **Performance Objective** | The IESO is perceived as a leader in the electricity sector. |
| **Measure D1.1** | Reputation amongst customers and stakeholders. |
| **Target(s)** | • In the annual survey, the IESO is perceived as a leader amongst customers and stakeholders by over 50% of respondents.<br>• Management maintains visibility of the IESO by speaking at 55 engagements or other forums. |
| **Q3 Result** | • Annual survey results to be available in Q4, 2011.<br>• Management spoke at 44 speaking engagements. |

| D2 | |
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| **Performance Objective** | The IESO is able to influence important policy decisions that impact the IESO. |
| **Measure D2.1** | Strategic engagement with government, regulators and stakeholders to advance the IESO's objectives. |
| **Target(s)** | • Operability profile of the supply mix.<br>• The Electricity Market Forum will provide an actionable plan that is endorsed by stakeholders and presented to government in Q4, 2011. |
| **Q3 Result** | • Active participation on the NERC Planning Committee promotes IESO's position on the continent to influence a wide range of reliability issues. Examples contributing towards influencing messaging alignment, consistency in performance expectations across the NERC footprint and improved industry assessment capability include:<br>(1) Adoption of changes to Ontario-specific language in NERC's long-term reliability assessment to more accurately reflect the OPA/IESO relationship;<br>(2) Influenced changes to NERC's frequency response initiative, to better align Eastern Interconnection obligations with those of the other interconnections; and<br>(3) Provided technical support for NERC's modeling improvement initiative through training materials developed by IESO for the Eastern Interconnection Reliability Assessment Group (ERAG).<br>• Active technical participation in NERC's IVGTF. The IESO has significantly influenced the deliverables (technical reports) of the four teams, out of 13, in which we are active. As this effort moves forward, particularly in formulating new standards for renewables, the ground work laid in these early efforts will lead to better options for managing renewables, continent-wide, which should be positive for Ontario.<br>• Coal shutdown/conversion reliability assessments for the NW and SW Ontario requested by the OPA were completed. The assessments identified the conversion scenarios that meet the reliability standards requirements. |

| D3 | |
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| **Performance Objective** | The IESO maintains its supportive role of government policy in operational, market, and environmental planning activities. |
| **Measure D3.1** | IESO's technical capability supports government policy in the planning activities. |
| **Target(s)** | • Services provided to the OPA and relevant transmitters including, support of the integrated power system plan (IPSP) operability.<br>• Timely information products developed to meet reporting obligations and expectations; and<br>• Support provided under section 92, leave to construct, of the OEB Act, 1998. |
| **Q3 Result** | • Provide its technical expertise, including specialized analysis and recommendations, to support the OPA on integrated power system planning (IPSP) studies and coal shutdown/conversion studies.<br>• Completed and delivered coal conversion reliability assessments.<br>• Completed a preliminary study to investigate the impact of the application of NERC transmission planning standards (TPL-001-2 ) using the revised Bulk Electric System (BES) definition in 'Northern Ontario'.<br>• Completed the assessment of Options for Reinforcing East-West tie for Westward Transfer Capability (issued 18 Aug 2011).<br>• East-West Tie Feasibility Study: Draft of Supplementary Report on Station Layouts issued<br>• Collaborating with a provincial university to develop a variable generation modelling tool. This tool will be able to generate simulated historical wind and solar data/profiles (multiple years) with at least an hourly granularity. The tool is expected to facilitate in stochastic modeling of variable generation in relevant future operability and reliability assessments.<br><br>**Technical information products provided in Q3 included:**<br>• NPCC interim transmission review (2011-2016)<br>• NERC 2011/2012 Winter Assessment<br>• 18-Month Outlook (September 2011 – February 2013)<br><br>**Section 92**<br>The IESO provided document reviews, support and approval with respect to confirmation of the reliability and operational impacts and compliance requirements of proposed new or modified transmission reinforcements. The IESO continues to facilitate the connection of new generation and load and address reliability or congestion concerns for OEB leave to construct proceedings in which the IESO is participating. |