A full-page photograph of an underground construction site. In the foreground, a worker wearing a red hard hat, a high-visibility vest, and dark clothing stands looking up at a large, dark pipe being lowered into place. The pipe is suspended by cables and runs diagonally across the frame. The background shows a cavernous space with rough rock walls, concrete structures, and various construction equipment. Bright lights illuminate the scene, creating a high-contrast environment. The overall atmosphere is industrial and focused on large-scale engineering work.

# YUKON ENERGY CORPORATION

## 2010 Annual Report





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## MESSAGE FROM THE PRESIDENT

Yukon Energy's 2010 annual report was prepared under our Board's direction and represents a balanced and accurate summary of the Corporation's economic, environmental and social performance for the calendar year ending December 31, 2010.

As always, Yukon Energy's achievements in 2010 were dependant on the dedicated and highly skilled employees who work at our facilities. I would like to thank all our staff for their continued commitment to excellence.

Yukon Energy's primary focus in 2010 was a continuation of our 2009 work of improving system reliability while moving ahead with projects/concepts to ensure there is enough clean electricity available to meet current and future demand.

In terms of reliability, we once again devoted a significant portion of our core capital budget to projects aimed at reducing outages. It is gratifying to see that this work is paying off. There were substantially fewer outages on our Whitehorse–Aishihik–Faro transmission system in 2010 compared to 2009 (see page 11 for details). We do recognize, however, that more work needs to be done on the Mayo–Dawson system and we are committed to addressing that. We take our responsibility of providing safe and reliable electricity very seriously.

Demand for electrical power is growing in the territory and Yukon Energy's goal is to meet that need with electricity that is environmentally responsible, affordable, reliable and flexible. The Corporation devoted a great deal of time in 2010 to initiatives that will help us meet our goal. These include:

- Mayo B project, which involves building a new powerhouse downstream from the existing one. It will more than double the amount of hydro power that can be generated, from five to approximately 13 megawatts.
- Carmacks–Stewart Transmission Project – Stage 2, which will see our transmission system extended from Pelly Crossing to Stewart Crossing and will allow us to connect our two major hydro grids, thus providing more flexibility and reliability of service.
- Aishihik 3, which will see the installation of a seven megawatt hydro generator in our existing Aishihik hydro plant.
- Geothermal research, which has provided favourable early results in terms of the possibility of geothermal heat sources being a realistic option for energy production in the Yukon.
- Research into three hydro enhancement projects (Atlin Lake, Marsh Lake and the Gladstone Lakes) that could provide us with additional power in the winter when demand is at its highest peak.
- An assessment of the wind regime on Ferry Hill near Stewart Crossing and Mount Sumanik near Whitehorse.
- A study of BOS gasification technology, which converts landfill waste into energy.
- Exploration of the next generation of small and medium hydro development projects. Possible sites include the upper reaches of the Pelly River, the Faro region and the Carcross area.
- In conjunction with Yukon Electrical Company Ltd. and the Yukon government, continued work towards the development of a Demand Side Management policy and program and Independent Power Producers and Net Metering policies.

Details of all these initiatives can be found in this annual report.

2010 was a busy year in terms of regulatory filings. The Yukon Utilities Board (YUB) reviewed our Mayo B project, recommending that the project proceed. Hearings took place in the fall of 2010 for Yukon Energy's and the Yukon Electrical Company Ltd.'s joint Phase II Application. We expect the YUB's recommendations early in 2011. The YUB is also in the process of reviewing Yukon Energy's power purchase agreement with Alexco.

In the area of safety, I am very proud of Yukon Energy's excellent safety record. Our staff have now gone three years without a lost time incident, ranking us among the best small utilities in the country in terms of number of days lost.



Employees heading over the Millennium Trail bridge to take a safety course.

Photo: archbould.com

While our primary responsibility is to provide safe, reliable and cost-effective electricity to Yukoners, we have a strong connection to the communities in which we live and work. Yukon Energy offers financial assistance by way of cash donations to a wide variety of non-profit groups based in the Yukon. In 2010 we gave approximately \$75,000 to 42 community organizations. We also gave scholarships to 13 students entering pre-apprenticeship or post-secondary

programs. We completed the sixth year of an apprenticeship and training benefits agreement with the Na-Cho Nyäk Dun and Tr'ondëk Hwëch'in First Nations as part of an arrangement reached during the construction of the Mayo–Dawson transmission line.

As always, our ultimate goal is to achieve operational excellence. We measure our success by our ability to deliver safe, reliable power to our customers, our ability to attract and retain a skilled and

engaged workforce, our respect for the environment and for the communities and people we serve, and the knowledge that safety is a part of every decision we make and every action we take.

A handwritten signature in black ink, appearing to read 'DMorrison'.

David Morrison  
President and CEO



## CORPORATE PROFILE

Established in 1987, Yukon Energy is a publicly-owned electrical utility that operates as a business at arms length from the Yukon government. We are the main generator and transmitter of electrical energy in the Yukon. We work with our parent company Yukon Development Corporation to provide Yukoners with a secure supply of clean, electrical energy by focusing on renewable sources of power and energy solutions that complement our legacy hydro assets.

There are almost 15,000 electricity consumers in the territory. Yukon Energy directly serves about 1,800 of these customers, most of whom live in and

around Dawson City, Mayo and Faro. Indirectly, we provide power to many other Yukon communities (including Whitehorse, Carcross, Carmacks, Haines Junction, Ross River and Teslin) through distribution to the Yukon Electrical Company Limited. Yukon Electric buys wholesale power from Yukon Energy and sells it to retail customers in the territory.

Yukon Energy has the capacity to generate 112 megawatts of power. Seventy five megawatts of that are provided by our hydro facilities in Whitehorse, Mayo and Aishihik Lake (40 megawatts at Whitehorse, 30 megawatts at Aishihik and five

megawatts at Mayo), 36 megawatts by diesel generators (which we currently only use as backup) and 0.8 megawatts by two wind turbines located on Haeckel Hill near Whitehorse.

Yukon Energy is incorporated under and regulated by the *Business Corporations Act*, the *Public Utilities Act* and the *Yukon Waters Act*.

Our headquarters are located near the Whitehorse Rapids hydro plant in Whitehorse, with community offices in Mayo, Faro and Dawson City.

Line for Stage 2 of the Carmacks—  
Stewart Transmission Project.

Photo: archbould.com



## GUIDING PRINCIPLES AND VALUES

We strive to:

- make safety a priority in all that we do;
- recognize and encourage integrity, learning, growth and development;
- foster an attitude of teamwork;
- operate with respect for one another;
- be accountable to our customers and shareholders;
- act sustainably at all times (social, environmental and economic bottom line);
- be innovative when seeking energy solutions;
- take a proactive approach to meeting electricity needs;
- develop partnerships in working to meet electricity needs; and
- optimize the use of our existing assets for the benefit of rate payers.

## STRATEGIC PRIORITIES

### Optimize equipment to improve system reliability and system efficiency

Yukon Energy's first priority is to improve system reliability and efficiencies. To this end, we have already completed several system reviews, assessed needs and begun to invest in solutions. A significant portion of the capital budget is dedicated to improving and modernizing the system.

Efficiency projects like improving the performance of hydro generating equipment and transmission lines are underway. As well, the Whitehorse-Aishihik-Faro transmission line will be joined to the Mayo-Dawson transmission line so the hydro systems can be managed as one unit. Yukon Energy is also working with Yukon Electrical to find ways to improve distribution efficiencies.

### Develop clean energy solutions to meet demand

Yukon Energy's 20-Year Resource Plan, developed in 2005, will be assessed and updated in 2011. This provides a new opportunity to develop options for meeting expected near-term and mid-term energy needs.

Energy solutions include new generation and the conservation of energy through demand side and supply side programs.

### Engage Yukoners to better meet future energy needs

Yukoners rely on affordable electricity so they can have meaningful, healthy lives and a strong economy. Yukoners are also concerned about the environment and the impact of climate change. Yukon Energy would like to better engage customers, partners and stakeholders so they can participate in the planning to create a clean energy future.

To do this, Yukon Energy is committed to engaging with our customers and stakeholders in a variety of ways. We will work more closely with schools to provide students with information regarding energy issues and solutions. Where possible we will help customers explore ways to save energy and demonstrate energy innovation.

As well, Yukon Energy will seek out partnerships where collaborative energy solutions can be found that both support the existing customers and support the growth of the economy.



Going for a spin—our experimental wind turbines on Haeckel Hill.

Photo: Yukon Government



## ALIGNMENT WITH SHAREHOLDERS' LETTER OF EXPECTATION

Under both the *Yukon Development Corporation's Act* and the *Corporate Governance Act*, the Minister Responsible for Yukon Energy is to work with our parent, Yukon Development Corporation (YDC), to negotiate a protocol on an annual or bi-annual basis. That protocol outlines what is expected each year of both Yukon Energy and the Development Corporation. In addition, it has been the practice of the Yukon government to provide the Corporations with additional guidance in the form of a Shareholders' Letter of Expectation.

The most recent letter – which covers the period from April 1, 2010 to March 31, 2012 – states that the Corporations will:

- work with the Yukon government and other stakeholders on the implementation of the Energy Strategy for Yukon and the Yukon Government Climate Change Action Plan, and in particular by participating in the development of an independent power producer policy, a net metering policy and a demand side management program;
- complete the financial arrangement transfer payment agreement with the Yukon government regarding Yukon Development Corporation's financial assistance;
- work with Yukon Energy to ensure both Corporations carry out their obligations under the Yukon Energy/First Nation of Na-Cho Nyäk Dun Project agreement;
- work with the Yukon government and Yukon Energy in preparing and implementing a workplan for Demand Side Management Initiatives;
- work with First Nation Development Corporations on economic development opportunities;
- ensure that Yukon Energy completes construction of Carmacks–Stewart Transmission Line Phase 2, thereby connecting the territory's two existing grids;
- ensure that Yukon Energy completes the Mayo B project prior to March 31, 2012;
- ensure that Yukon Energy continues work in preparation for the installation of the third turbine at the Aishihik hydro facility in anticipation of a winter 2011-12 in-service date; and
- work with Yukon Energy to increase energy capacity by enhancing existing infrastructure including improved efficiencies at the Whitehorse hydro plant, assessing ways to reduce line losses and the continued evaluation of the Atlin River, Marsh Lake and Gladstone Lakes storage concepts.

## OUR EMPLOYEES

Yukon Energy employs approximately 85 highly skilled and dedicated people in Whitehorse, Faro, Mayo and Dawson City. We are committed to being the employer of choice in Yukon. We value our employees and ensure that we provide a respectful work environment. We offer competitive salaries, excellent benefits, generous paid vacations, vacation travel allowance and comprehensive training.

In Yukon Energy's overall Human Resources strategy, employees are deemed essential to the realization of the corporate vision. To maintain and enhance the skills needed to achieve our business objectives, the Corporation undertakes to:

- attract, recruit and retain a competent work force that shares our values and is motivated to help sustain and improve the company's assets;
- offer our employees opportunities for professional development to ensure a high level of skill, expertise and leadership; and
- ensure succession planning and the continuity of know-how.

### Apprenticeship Program

Yukon Energy's apprenticeship program is an important part of our human resource strategy in meeting some of our labour needs for both the present and future. It is rewarding to see how far the program has progressed since it was implemented in 2006. Since that time, about a dozen Yukoners have gone

through our apprenticeship program in the areas of power systems electrician, powerline technician and heavy duty equipment technician. Almost all of them continue to work for us now that they have their journey tickets. Four more are in the process of getting their certification.

Congratulations to the following employees for receiving their journey certification in 2010:

- Jeremy Germaine – Powerline Technician
- Justin Kolla – Power Systems Electrician

In 2010 Yukon Energy established an Apprenticeship Certification Reward Program as a way of recognizing all our current staff who have received their journey certification with us. This year the following employees received a limited edition print created by a local artist specifically for their trade certification:

- Al Hammond – Power Systems Electrician
- Bob Burrell – Power Systems Electrician
- Dave Bourque – Powerline Technician
- Jeremy Germaine – Powerline Technician
- Jim Petelski – Heavy Duty Equipment Technician
- Justin Kolla – Power Systems Electrician
- Mike Sage – Powerline Technician
- Nick Balderas – Power Systems Electrician

### Competency Assessment Program

Yukon Energy is facing challenges in the near future due to the potentially high number of retirements, demand for additional labour requirements as a result of new infrastructure, and changing technology. As new employees are hired, the need for assessing competency and training requirements is critical for maintaining a skilled workforce.

During the last quarter of 2010 Yukon Energy embarked on a new initiative to develop a competency assessment program for workers. A committee was struck made up of representatives from each of our trades groups, as well as the Health and Safety Department. The aim is to identify the core competencies needed for each trade, to note any gaps in skills or knowledge, and to ensure appropriate training is provided to fill those gaps, whether that be through formalized training (which can be provided by an external vendor) or mentoring and coaching on the job. For the competency assessment process to be successful there must be follow-up on the identified gaps in performance.



Electrician Willy McKenna hard at work.

Photo: archbould.com

## LONG SERVICE AWARDS

We are proud of our workforce and we have adopted several initiatives to celebrate and recognize our employees' efforts. These include an annual celebration to recognize employees achieving milestones, annual employee and children's Christmas parties, summer barbeques, golf tournaments and other ad-hoc get-togethers. We would like to congratulate our 2010 Long Service Award recipients:

- Cassandra Crayford – 30 years
- Gary Jones – 30 years
- Al Hammond – 20 years
- Bob Burrell – 20 years
- John Aldrich – 20 years
- Ron Gee – 20 years
- Nick Balderas – 10 years
- Sulem Darani – 10 years
- Myles O'Brien – 5 years
- Philippe Cashaback – 5 years
- Tina Liedtke-Thompson – 5 years



## SUMMARY OF UTILITY OPERATIONS

	2010	2009	2008	2007	2006	2005
<b>Generating Capacity (in MW)</b>						
Hydro	75	75	75	75	75	75
Diesel	36	36	36	36	36	36
Wind	1	1	1	1	1	1
<b>Total</b>	<b>112</b>	<b>112</b>	<b>112</b>	<b>112</b>	<b>112</b>	<b>112</b>
<b>Peak Demand (in MW)</b>						
WAF System	67	65	64	59	61	56
Mayo	7	5	5	5	5	4
<b>Total</b>	<b>74</b>	<b>70</b>	<b>69</b>	<b>64</b>	<b>66</b>	<b>60</b>
<b>Generation (in GWh)</b>						
Whitehorse Rapids	234	224	206	206	217	202
Aishihik	112	119	107	98	81	81
Mayo	32	29	28	27	27	25
Wind	0	0	0	0	1	—
WAF Diesel	3	2	1	0	1	—
Other Diesel	2	1	0	1	—	1
<b>Total</b>	<b>383</b>	<b>375</b>	<b>342</b>	<b>332</b>	<b>327</b>	<b>309</b>
<b>Electric Sales (in \$000)</b>						
Residential	1,524	1,535	1,523	1,509	1,456	1,397
General Service	3,315	3,007	2,804	2,731	2,645	2,838
Industrial	3,311	3,191	329	—	—	—
Wholesale	23,301	22,291	22,999	22,459	22,127	20,925
Secondary Sales	644	1,442	777	1,000	917	767
Other	83	81	86	377	383	371
<b>Total</b>	<b>32,178</b>	<b>31,547</b>	<b>28,518</b>	<b>28,076</b>	<b>27,528</b>	<b>26,298</b>
<b>Electric Sales (MWh)</b>						
Residential	11,409	11,596	11,359	10,908	10,665	10,169
General Service	22,420	20,042	18,523	17,507	17,037	18,438
Industrial	30,255	29,355	3,200	—	—	—
Wholesale	276,345	267,229	263,820	254,914	251,861	237,419
Secondary Sales	10,489	17,384	18,753	24,225	22,185	18,933
<b>Total</b>	<b>350,918</b>	<b>345,606</b>	<b>315,655</b>	<b>307,554</b>	<b>301,748</b>	<b>284,959</b>
<b>Cents Per kWh</b>						
Residential	13.36	13.24	13.41	13.84	13.66	13.74
General Service	14.79	15.00	15.14	15.60	15.52	15.39
Industrial	10.94	10.87	10.28	—	—	—
Wholesale	8.43	8.34	8.72	8.81	8.79	8.81
Secondary Sales	6.14	8.29	4.14	4.13	4.13	4.05

### Explanatory Notes:

1. General Service sales growth was due to increased business for companies that provide support materials/services to mines.
2. Alexco Resources became an industrial customer in November 2010.
3. Larger than usual increase on Wholesales was due to Yukon Electrical Company Ltd.'s Fish Lake hydro being out of service since June 2010.
4. Secondary sales were discontinued effective September 1, 2010 because of insufficient surplus hydro.

## ENSURING RELIABILITY OF SERVICE

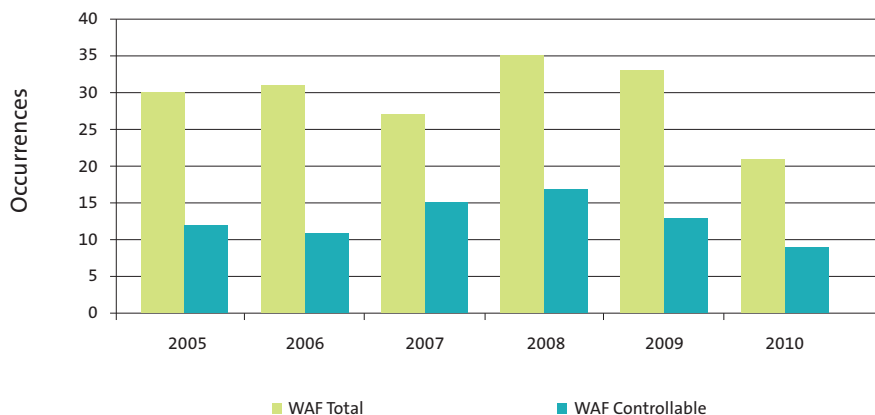
We take our responsibility to provide reliable power very seriously. Two years ago Yukon Energy embarked on an aggressive capital maintenance schedule that saw approximately two-thirds of our core capital budget go towards projects related to reliability. Since that time we worked our way through a list of maintenance capital projects, and as a result we have seen

significant improvement in terms of number of outages on our Whitehorse–Aishihik–Faro (WAF) transmission system. There were nine controllable outages on our WAF grid in 2010, compared to 13 in 2009 and 19 in 2008. Of the nine controllable outages in 2010, only two were grid wide. The other seven were limited to a very small geographic area.

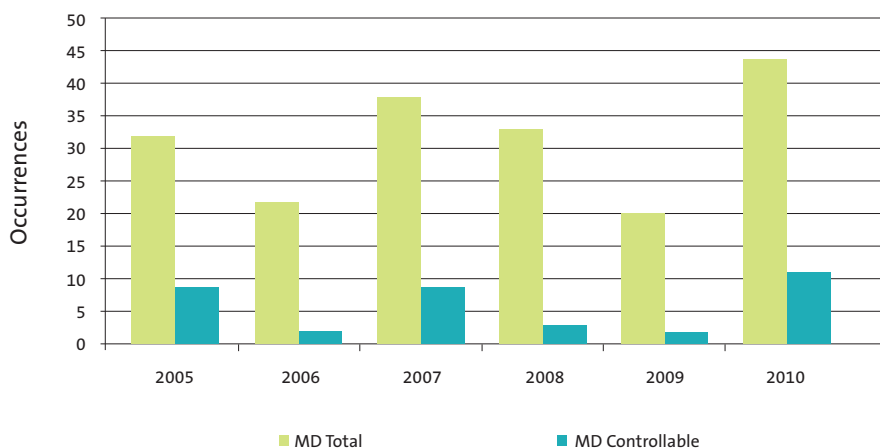
The results were not so favourable on our Mayo–Dawson (MD) grid. In 2010 we had twelve controllable outages, up from two in 2009. Clearly more work must be done to ensure we can provide safe, reliable energy to our customers. Along with continuing with our enhanced maintenance program, it is important that we provide adequate training to our tradespeople, a significant percentage of whom are relatively new to the industry. Uncontrollable outages were also up on the Mayo–Dawson grid, primarily because of increased lightning strikes on the line.

Yukon Energy is continuing the process of selecting and purchasing a new business management system, which would include a maintenance management tool. This tool will allow us to manage our maintenance projects through an easy-to-access registry of all our equipment. Maintenance tasks and job plans will be associated with each asset. Technicians will be able to read and record a history log for the equipment that they work on and initiate repairs. When fully functional, the system will help support effective planning, budgeting and scheduling of the maintenance work we do at Yukon Energy. We expect the implementation of this system to begin in 2011.

### WAF Outage Data



### MD Outage Data



## MEETING DEMAND NOW AND INTO THE FUTURE

Yukon Energy is planning for the future in ways that will ensure a secure and continuous supply of clean, affordable energy. Our goal is to meet the growing demand for electricity with renewable energy that complements our existing hydro system. To that end, we pursued a number of initiatives in 2010 that will enhance our current infrastructure.



One of many frosty days during the construction of the Mayo B powerhouse.

Photo: KGS Group Consulting

### Mayo B

The Mayo B project involves building a new powerhouse about three kilometres downstream from the existing powerhouse. It will increase the amount of power that can be generated from the Mayo River from five megawatts to approximately 15 megawatts.

Yukon Energy awarded the Mayo B construction contract to Peter Kiewit Infrastructure Company in March of 2010. In April we reached a Project Agreement with the First Nation of Na-Cho Nyäk Dun, which among other things will allow the First Nation government to invest in the Mayo B project and to receive jobs and other economic and social benefits for its membership. Construction began in June once all the necessary permits were in hand. By late 2010 the bulk excavation was finished, most of the portal/tunnel was excavated, the bulk of the powerhouse foundation and structure was complete and the manufacturing of the turbine and generator was underway. Mayo B is expected to be in service by the end of 2011.



The federal government is providing \$71 million for Mayo B and for completion of the Carmacks–Stewart Transmission Project (collectively known as the Green Energy Legacy Project). Other funding is coming from the First Nation of Na-Cho Nyäk Dun, the Yukon government and Yukon Energy.

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### Carmacks–Stewart Transmission Project Stage 2

Work continued in 2010 on Stage 2 of the Carmacks–Stewart transmission line (Stage 1 from Carmacks to Pelly Crossing was completed in 2008). Stage 2 will see the line extended from Pelly Crossing to Stewart Crossing. It will allow Yukon Energy to connect our two hydro grids (Whitehorse–Aishihik–Faro in the Southern Yukon and Mayo–Dawson in the Northern Yukon), thus providing more flexibility and reliability of service.

The clearing work on Stage 2 was completed by mid-February 2010 and the line construction started in March. By the end of 2010, the line construction was almost complete and work was moving ahead on the necessary substations. We expect the line to be energized by the spring of 2011.

We anticipate that the construction of Mayo B and Carmacks–Stewart Stage 2 will provide substantial economic benefits for Yukoners. In total, it's estimated that between 200 and 300 local residents have worked/will work on these two projects. The projects will reduce greenhouse gas emissions by approximately 25,000 tonnes annually.

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### Aishihik 3

This is another project aimed at enhancing existing infrastructure. By adding a seven megawatt hydro generator to the existing Aishihik hydro plant (which currently has two 15 megawatt hydro generators) we will be able to use our plant more efficiently since it will give us the ability to produce the same amount of power using less water. In 2010, Yukon Energy prepared the Aishihik plant for installation of the new turbine, which should take place in the spring of 2011. Yukon Energy also obtained permission from the Yukon Water Board to run all three hydro units at once when needed. This new unit will save Yukoners \$1 million or more per year in diesel costs and reduce greenhouse gas emissions by an estimated 3,800 tonnes annually. It is scheduled to be in operation by late 2011.

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### Geothermal

Yukon Energy is looking at all possible sources of clean, renewable energy to meet future demand, including geothermal. Because Yukon is located in an area of the Pacific Rim known as the Ring of Fire, we believe the potential is good for finding significant geothermal resources that could be used to produce electricity.

Early results from research in 2009 were favourable, particularly at Jarvis Creek near Haines Junction. Yukon Energy plans to do further drilling at Jarvis Creek in the spring of 2011. Geothermal heat sources, once built, are a highly efficient, reliable supply of clean electricity.

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### Wind

While our two experimental wind turbines on Haeckel Hill have presented some ongoing challenges, we continue to look for ways of using wind as a part of our clean energy complement. Yukon Energy has completed an assessment of the wind regime on Ferry Hill near Stewart Crossing. The results are positive enough that we are now seriously looking at the feasibility of installing up to a 20 megawatt wind farm on the site. Early in 2011 we will set up some monitoring equipment on Ferry Hill which will gather a minimum of 12 months worth of data for us.

Yukon Energy is also revising the wind regime of Mt. Sumanik near Whitehorse and we are looking into new technologies in de-icing systems.

As well in 2011, we will have some large scale mapping done of other potential wind sites along or near our transmission corridors.

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### Enhanced Storage Projects

Yukon Energy is committed to optimizing our existing hydro infrastructure before developing new hydro projects. To this end, there are a number of enhancement concepts we are examining that will increase production at our Whitehorse and Aishihik hydro facilities. These include additional storage in Marsh Lake and storage in Atlin Lake, both of which would increase the winter output of our Whitehorse hydro facility. Both of these potential projects may allow for flood mitigation on Atlin and Marsh Lakes. A third enhancement concept would involve diverting water from

Gladstone Creek into Aishihik Lake, allowing more power to be produced at our Aishihik plant. These three projects could provide up to 38 additional gigawatt hours of energy annually (a maximum of 18 from Gladstone, a maximum of 18 from Atlin and seven from Marsh Lake).

In 2010, Yukon Energy held a series of meetings with various local governments, stakeholders and residents to discuss these concepts. We also spent several months doing various field studies aimed at obtaining enough hard data to be able to conclude whether any or all of these concepts are viable projects.

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## New Hydro

Yukon Energy is exploring the next generation of new hydro development projects (i.e. 2012 to 2020 time frame), such as possible sites on the Hoole and Slate Rivers in the upper reaches of the Pelly River. We believe this would provide between 150 and 275 gigawatt hours of energy annually. In 2010 money was spent on digital mapping and hydrology on the Pelly River. This work will continue in 2011.

We are also assessing some potential small hydro opportunities in the Faro and Carcross areas.

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## Waste-to-Energy

Yukon Energy spent time in 2010 studying technology known as the BOS gasification system. It harnesses the energy in ordinary landfill waste using a high temperature process. We believe this process could allow us to produce up to two megawatts of electricity year-round using waste from Whitehorse-area landfills.

There are a number of issues that still must be addressed, including how to maintain continued emphasis on recycling and waste diversion, ensuring all harmful emissions will be removed to air emission/control standards, and finding local uses for the valuable steam and waste heat byproducts. Yukon Energy will continue to investigate this possible electricity source in 2011.

---

## Independent Power Producers/Net Metering

Yukon Energy is working with Yukon Electrical Company Ltd. and the Yukon government on Independent Power Producers (IPPs) and net metering policies. Again, work will continue in 2011 on these initiatives. When implemented, a net metering policy will allow customers to generate their own clean electricity and reduce the amount of power they buy from a utility. An IPP policy will enable Yukon Energy to buy power from private sources and support the development of Yukon's renewable economy.

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## Diesel Improvements

While we consider ourselves primarily a producer of renewable energy, there are times when we must rely on our backup diesel generators to meet the demand for electricity. Work continued in 2010 to rebuild two of our oldest large diesel generators—one in Faro and one in Whitehorse. This is being done as a cost-effective means of ensuring there is adequate backup generation available on the Whitehorse–Aishihik–Faro grid in the event of loss of one or more renewable energy generators.

Over the next several years we will look at refurbishing two more Whitehorse diesel generators as necessary.

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## Secondary Sales

In September 2010, low water at Yukon Energy's Aishihik and Mayo hydro facilities forced us to indefinitely suspend secondary sales to our wholesale customer, Yukon Electrical Company Ltd. Secondary sales were also suspended to Yukon Energy's one retail customer, the Mayo school.

At Aishihik the water flows during the summer of 2010 were about 70 percent of what they are during an average year. At Mayo, the flows were about 80 percent of what is considered normal. Continuing with secondary sales would mean Yukon Energy would be forced to burn more diesel to make up the hydro shortfall.

The Secondary Sales Program has operated since 1998. It gave eligible Yukon businesses the option of using hydro power to heat their facilities instead of diesel fuel or propane, both of which are more expensive. They paid two-thirds of the cost of 'firm' power in exchange for the service being limited and fully interruptible. They were required to maintain a back-up heating system for use when secondary sales were not available, such as on cold winter days.

Yukon Energy has always made it clear that secondary sales would only be offered as long as there was surplus hydro electricity. Secondary sales customers have for the past several years benefited from this program and have seen substantial savings.

## MEETING OUR REGULATORY OBLIGATIONS

### Yukon Utilities Board Hearings

2010 was a busy year in terms of regulatory filings. In April, hearings took place with regards to the Mayo B project. In its recommendations to the Yukon's Justice Minister, the Yukon Utilities Board (YUB) said there was a clearly demonstrated public benefit to Mayo B and it recommended that the project go ahead.

Oral hearings took place in October for Yukon Energy's and the Yukon Electrical Company Ltd.'s joint Phase II Application. The purpose of the hearing was, among other things, to help the YUB determine how it thinks the rates within each class should be designed. The utilities presented three options, all of which were aimed at encouraging energy conservation. We expect the YUB's recommendations early in 2011.

The YUB is also in the process of reviewing Yukon Energy's power purchase agreement with Alexco, with recommendations also expected in early 2011.

Working underground at the Aishihik hydro facility.

Photo: archbould.com





## HEALTH AND SAFETY

### Certificate of Recognition

After successfully attaining our Certificate of Recognition (COR) for workplace safety in 2009, Yukon Energy is taking the next step. We are now requiring contractors doing construction work for us to be COR certified. As of July 2010, this applied to construction contracts valued at \$500,000. Starting in July 2011 we will require COR certification for construction contracts valued at \$100,000 or more. In July 2012 it will apply to construction contracts of any value. The COR is issued to employers who develop and implement health and safety programs that meet established standards set out by the Northern Safety Network and the Yukon Workers' Compensation Health and Safety Board.

In 2010 Yukon Energy's Health & Safety Department expanded with the addition of a Safety Coordinator. This position includes assisting with field level inspections, audits and developing/documenting safe job procedures and practices.

### Wellness Program

Yukon Energy recognizes the benefits of a healthy workforce. Three years ago we introduced an employee wellness program to promote and support our staff's physical and mental health. In 2010, more than 30 percent of the employees took advantage of the Corporation's wellness subsidy program.

### Safety Record

Yukon Energy would like to recognize the excellent safety record that our employees have achieved. As of the end of 2010, Yukon Energy staff worked three years without a lost time incident. This safety record is a testament to our employees' high standard of safe work practices. Yukon Energy's lost time severity rate (the number of days lost) is among the lowest in the country for Canadian Electricity Association members who have fewer than 300 employees.

### Public Safety Campaigns

Yukon Energy's Whitehorse Rapids hydro dam is located within city limits and in the heart of a popular recreational area used by runners, hikers, kayakers and dog walkers. Because of this, public safety is a priority for us. As in previous years, we ran an annual media campaign in 2010 that warned people of the dangers of being near a hydro dam. In addition, we continued to distribute a safety booklet aimed at elementary school children. The booklet focuses on the importance of taking care when playing or recreating near or on water that is close to our hydro facilities.

Working with the Yukon government's Energy Measures Organization, Yukon Energy produced an emergency preparedness handbook that was mailed to every household in the territory. The booklet provides practical

information about how to make a family emergency plan, what to put in an emergency kit and what to do in the event of an emergency.

The boat lock at Yukon Energy's Lewes dam is frequently used by travellers on the Yukon River. In 2010 we replaced and enhanced the safety and information signage at the boat lock. Since vandalism was an ongoing problem, we also installed surveillance cameras on site.

Installation of LED streetlights in Dawson City—one of a number of energy efficiency initiatives Yukon Energy is undertaking.

Photo: archbould.com



## PROTECTING OUR ENVIRONMENT

### Environmental Management

Yukon Energy is committed to helping sustain a healthy environment for Yukoners by maintaining a high standard of environmental responsibility and performance through the implementation, monitoring, review and continual improvement of our environmental management system and programs. The Corporation recognizes that in carrying out our activities and in providing services and products to Yukoners, there will always be environmental impacts. Our goal is to balance the need for safe, reliable and affordable energy with that of meeting Yukoners' energy requirements without significant adverse effects on the environment or to the people who depend on that environment. We work

to achieve this goal by integrating environmental considerations into our decision-making and planning and by engaging with stakeholders in a timely and transparent manner.

### Climate Change/GHG Emission Reductions

Yukon Energy is committed to managing greenhouse gas emissions to mitigate the impact of our operations on climate change, while adapting to its effects. Yukon Energy recognizes that we cannot address climate change alone and we continue to work with government, other organizations and individuals to adopt an appropriate and workable approach.

Some of the initiatives ongoing or new in 2010 aimed at minimizing

greenhouse gas emissions and addressing the need to adapt to potential climate change impacts included:

- construction of Stage 2 of the Carmacks—Stewart Transmission Line Project;
- construction of the Aishihik third turbine;
- pilot energy efficiency program with Light Emitting Diode (LED) streetlights;
- studying renewable alternative energy supplies with low carbon footprints to offset diesel generation (e.g., geothermal, wind, hydro-enhancements); and
- preparing for climate change vulnerability assessments of key infrastructure in 2011.

## ENERGY CONSERVATION

A big focus for Yukon Energy in 2010 was to identify and take advantage of conservation and efficiency opportunities, both for our customers and for us as a utility. We worked with Yukon Electrical Company Ltd. and the Yukon government to develop a comprehensive energy conservation plan. That work will continue into 2011. We also worked to improve efficiencies of our own equipment and assets.

In the meantime, there are things Yukon Energy has put in place now to help reduce the amount of electricity we all use.



A closer look at one of the LED streetlights installed in Dawson City.

Photo: archbould.com

## Energy Conservation

In partnership with the Yukon government's Energy Solutions Centre, Yukon Energy installed six LED streetlights in Dawson City in 2010. Over the winter and into the spring of 2011 we will monitor the lights for cold weather performance and energy use. At the end of this test period Yukon Energy will look at whether to replace all our streetlights in the communities we serve directly (Dawson, Faro and Mayo). Early results indicate the LED streetlights are using 70 percent less energy than traditional streetlights and public reaction to the lights has been very positive.

Yukon Energy is also contributing financially to a similar LED streetlight pilot project that Yukon Electrical Company Ltd. is doing in Whitehorse. In exchange for our financial support, Yukon Electrical Company will share its data with us.

A simple energy conservation tool that is proving to be very popular with customers is a set of energy consumption charts on our website at [yukonenergy.ca/customer/residential/consumption/](http://yukonenergy.ca/customer/residential/consumption/).

The charts are aimed at helping Yukoners manage their energy use and reduce the amount of diesel generation needed to meet peak energy demands in winter. They show, in near real-time, how much energy is being used, and whether we are using diesel to meet the demand for power. A number of people have told Yukon Energy that they have shifted their energy-use habits as a direct result of these consumption charts.

We have also added to our website a virtual energy savings home. With a simple mouse click, people can visit various rooms in a typical house and find out how much they could save in electricity costs by adopting simple energy conservation measures.

## Whitehorse Rapids Fishway

Yukon Energy is proud of our commitment to environmental stewardship and biodiversity. In cooperation with our partners the Yukon Fish and Game Association and the Yukon government, we maintain one of the world's longest fishladders. It not only provides passage for migrating Chinook salmon beyond the Whitehorse dam, but offers opportunities for scientific and cultural information gathering and sharing. It is one of the territory's most popular tourist destinations.

Improvements in 2010 included more new interpretive panels and Phase 2 of a community art project that involved 300 students from six schools from around the territory.

A total of 672 salmon passed through the ladder in 2010, compared to 828 the year before.



Biologists scanning the Mayo B project area for birds' nests. If a nest was found, the area was flagged and left undisturbed until the birds abandoned the nest later in the summer.

Photo: EDI Environmental Dynamics



## Whitehorse Rapids Fish Hatchery

Yukon Energy, with our partner, the Yukon government, operates an important fish hatchery on the Yukon River in Whitehorse. For the third year in a row, the hatchery was able to support a Ta'an Kwäch'än First Nation initiative to re-introduce Chinook salmon to Fox Creek by providing salmon eggs for the program.

## Aishihik Lake Whitefish Stewardship

As part of our ongoing commitment to ensuring impacts of our operations are reduced, minimized or avoided, Yukon Energy – with our resource management partners the Department of Fisheries and Oceans, the Yukon government and the Champagne and Aishihik First Nations – successfully completed our 12th annual Aishihik

Lake Whitefish Monitoring Program. The 2010 program consisted of small mesh gillnetting and beach seining. The intent of the program is to monitor the success of whitefish spawning by observing the emergence of young fish into the lake whitefish population.

The 2010 monitoring was performed with lower lake levels and above average water temperatures than previous years. Beach seining results indicated successful incubation and early survival of lake whitefish. The gillnetting component required two surveys to meet the target number of juvenile lake whitefish as capture rates were low in early August. A second survey was completed in September after water levels had increased and water temperatures had decreased, and a total of 312 juvenile lake whitefish were captured of which 240 were young-of-year.

Also in 2010, there was continued discussion with the Champagne and Aishihik First Nations, Yukon

government's Department of Environment and the federal Department of Fisheries and Oceans on the potential revision to the current *Fisheries Act* authorization for Aishihik Lake. Yukon Energy proposed a new draft fisheries authorization for consideration by the monitoring team. However, following much deliberation, the Chief and Council of the Champagne and Aishihik First Nations rejected the proposal. Continued discussions are expected to take place with all members of the monitoring team in 2011.

# BUILDING PARTNERSHIPS WITH FIRST NATIONS

## Protocol Agreements

Yukon Energy believes in building enduring business partnerships with First Nations for energy projects in Yukon and northern B.C. In 2010 we began a process aimed at reaching protocol agreements with a number of local First Nation governments and their development corporations. The purpose of the agreements is to provide a framework for us to work on energy development in a collaborative and respectful manner. Yukon Energy will continue to pursue this in 2011.

## Mayo B Project Agreement

In 2010 Yukon Energy signed a project agreement regarding the Mayo B project with the First Nation of Na-Cho Nyäk Dun (NND). The agreement outlines economic opportunities and benefits for the First Nation, including provisions for investment in the project. Benefits include:

- priority hire to qualified NND citizens by Peter Kiewit (the construction contractor) and all subcontractors;
- a full-time NND liaison for the duration of the project as a point of contact between Kiewit and NND members who are looking for work or are employed on site;
- “in kind” equipment and labour to assist local NND and Village of Mayo projects;

- an opportunity for the NND Development Corporation to negotiate the acquisition of equipment when the project is complete; and
- design and construction of a legacy project: a new general store in Mayo.

Numerous Mayo and Yukon-based businesses have provided employment to Yukoners since the Mayo B project began in 2010. These economic and employment benefits will increase during the 2011 construction season.

The total amount spent in Yukon on this project to date is in excess of \$7 million.

## Carmacks—Stewart Transmission Project Agreement

Part of our work for the Carmacks—Stewart transmission project involved meaningful and ongoing consultations with the three Northern Tutchone First Nations, trappers, project area residents, Renewable Resource Council members, government departments, municipal councils and other members of the public. Yukon Energy reached a project agreement with the Northern Tutchone First Nations in 2007, which addressed such issues as land use and socio-economic benefits for their members. The First Nations partnered with other companies on clearing and construction of both stages of the line.

In total, at least 250 Yukoners worked on the Carmacks—Stewart transmission project (Stages 1 and 2).

## Mayo—Dawson Transmission Line Benefits Agreement

The Mayo—Dawson City transmission line, which has operated since the fall of 2003, involved building a 232 kilometre long transmission line and related infrastructure to connect the City of Dawson to the Mayo hydroelectric station. It has allowed Yukon Energy to supply some of Dawson City’s electricity needs with clean hydro electricity. (Dawson’s diesel generators provide the rest.)

In 2010, for the sixth full year, Yukon Energy fulfilled our training agreements with the First Nation of Na-Cho Nyäk Dun and the Tr’ondëk Hwëch’in First Nation, as part of the Mayo—Dawson Transmission Line Benefits Agreement. Through this agreement, we provide each of the two First Nations up to \$15,000 a year for apprenticeship and training opportunities. The agreement is for 20 years with an option to renew for a further five years. We believe this is going a long way in helping the Tr’ondëk Hwëch’in and Na-Cho Nyäk Dun achieve their training needs and is assisting members of the two First Nations to find meaningful employment.

**Yukon Energy signs Mayo B project agreement with the First Nation of Na-Cho Nyäk Dun.**

## ENGAGING YUKONERS

### Public Information Campaign

Yukon Energy is aware that electricity issues are complicated. In 2010 we embarked on a major public information campaign as a way of helping Yukoners better understand the strategic direction in which we are going and why we are pursuing that particular direction. The campaign also focused on helping the public gain more knowledge about the specific projects and research that we were undertaking.

Elements in the campaign included a baseline public opinion survey, radio/print/online advertising, a householder pamphlet, speaking engagements/public meetings, and enhancements to our website and blog. In 2011 we will do a follow-up public opinion survey to find out if the information campaign did, in fact, raise Yukoners' knowledge about Yukon Energy.

### Energy Charrette

One of our key commitments, as outlined in our Strategic Plan, is to better engage Yukoners in energy issues. To this end, planning began in 2010 to host an energy charrette. The event, scheduled for the spring of 2011, will bring together stakeholders, energy experts, and the general public for three days of discussion, inspiration and planning. We will also host energy workshops in three rural communities. The recommendations from the community sessions and the charrette will act as guiding principles for Yukon Energy as we make energy related decisions into the future, and will help to inform our 20-year resource plan which we will update in 2011.

### Project Specific Public Information

In terms of keeping the public up-to-date on specific projects and concepts that Yukon Energy is undertaking, the Corporation held several public meetings and/or open houses in 2010. These included Mayo, Marsh Lake (three times), Tagish (three times), Atlin (three times), Carcross, Haines Junction and Whitehorse. During summer 2010 the Corporation set up an office in Atlin which was staffed once a week, providing local residents with regular face-to-face contact with us while our contractors conducted field research into the Atlin River hydro enhancement concept.

Yukoners were provided with regular updates on Mayo B, the Carmacks—Stewart transmission line, and the Gladstone, Marsh Lake and Atlin River concepts via a series of newsletters that were distributed to community members and posted on our website. Frequent updates were also provided on our blog.

At the spring meetings held in the Southern Lakes communities, Yukon Energy took the opportunity to update the public on what we expected peak summer water levels would be. The information is useful to residents because it assists them in preparing their properties for possible flooding in high water years. *Note that 2010 was not a high water year.*

In addition to the public meetings, Yukon Energy provided weekly summer water level updates to Tagish and Marsh Lake residents via email, posters and our website and blog.





## SUPPORTING OUR COMMUNITIES

### Whitehorse Food Bank

Yukon Energy is a fervent supporter of the Whitehorse Food Bank, a facility that assists hundreds of needy Yukoners. 2010 was the third year in a row that Yukon Energy contributed financially to the organization.

### Dawson City Museum's Educational Program

Once again in 2010, Yukon Energy teamed up with the Dawson City Museum to develop a new educational program for Yukon students.

In 2009 we were involved in an innovative pilot project that saw students in grades 4–6 experience the hardships and rewards of the Gold Rush in a hands-on way by spending a night at the museum and assuming a character from the Gold Rush.

The 2010 initiative brings the museum to the students. Museum staff have developed a kit that is delivered right to the classroom. The kit includes museum artifacts that introduce students to six types of simple machines (lever, wedge, pulley, ramp, screw and wheel). Through a series of experiments and observation exercises, the children learn concepts that are covered in the grade 5 science, math and social studies curriculum. The kit is being piloted at the Dawson City school and will soon be made available to schools throughout Yukon.

### Available Light Film Festival

This winter film festival is a popular event; in 2010 over 3,000 people turned out to view more than two dozen movies from all over the world. For the past two years Yukon Energy has been the co-presenter of the festival along with the Yukon Film Society.

A portion of our sponsorship money helps fund the festival's school shows. Our support covers the extra costs of communicating and coordinating with schools, and renting buses to transport the children to the film venue.

### Yukon Energy Klondike Heat Battle

Yukon Energy was the presenting sponsor for this event organized and hosted by Breakdancing Yukon. This dance competition drew some of the best b-boys and b-girls from Yukon and across Canada. The weekend included demonstrations, competitions (battles) and dance challenges. It was pure fun and entertainment for both the participants and the 300 or so audience members.

### Territorial Skills Competition

Once again this year, Yukon Energy joined with Skills Canada Yukon in promoting trades and technology careers among local youth and apprentices. The partnership included financial and in-kind assistance for the 12th Annual Yukon Territorial Skills

Competition planned for the spring of 2011 in Whitehorse. The event will showcase approximately 30 trades and technologies and involve more than 1,000 participants and observers.

### Financial Contributions to Other Non-Profit Groups

Yukon Energy continues our tradition of sponsoring the good work of many non-profit organizations throughout the territory. Through our corporate contributions program, we donated approximately \$75,000 to more than 40 community groups in 2010. The list covered everything from sports and recreation, the arts, education and health and social services.

Any organization seeking sponsorship must prepare a request for funding and submit it to Yukon Energy's Corporate Contributions Committee. In order to be eligible for money, the group must be registered as a non-profit organization in the territory.

Since there are always more requests than there is money, the applications are weighed against certain criteria:

- Does it align with Yukon Energy's values and mandate?
- Will the event or project benefit the community at large?
- Will it benefit youth and/or the underprivileged?
- Is the event or project in one of our service areas?
- How will Yukon Energy be publicly recognized for our contribution?



## SCHOOL/PUBLIC TOURS

Yukon Energy believes in the importance of educating tomorrow's generation about electrical production, energy conservation and electrical safety. To this end we offered numerous school tours in 2010 of our Whitehorse hydro plant, wind energy production site and fishladder.

President David Morrison talking about energy issues at Wood Street School in Whitehorse.

Photo: Mike Thomas

## Scholarships

Once again this year Yukon Energy offered several scholarships for pre-apprenticeship as well as post-secondary programs. In total, scholarships were given to 13 deserving post-secondary students in 2010.

Congratulations to this year's recipients:

Lauren Wallingham  
Chantel Blysak  
Kyrie Nagano  
Shauna Kormendy  
Nicole Rae-Lynn Cook  
Kristen Cook  
Mindy Anderson  
Samantha Pavloich  
Robert Ford  
Jason Zrum  
Julia Spriggs  
Michael Abbott  
Douglas de la Mare

## Yukon Sustainable Community Award

Four years ago, Yukon Energy entered into a partnership with the Association of Yukon Communities to recognize leadership in sustainable community development. Each year we present an award to an individual or group for a project that demonstrates environmental sustainability. In 2010 the award went to the City of Whitehorse for the good work it has done on revising its Official Community Plan.

## Swan Cam

One of the first signs of spring in the Yukon is the return of the swans and other waterfowl as they head to their nesting grounds further north. The birds gather by the hundreds at M'Clintock Bay on Marsh Lake in the southern Yukon. The bay is the first open water in the region and offers the birds easy access to food.

Each spring Yukon Energy sets up a webcam so that people can view the waterfowl in real time via their computers. The public response has been very favourable, with people from all over the world going online to see the swans.

# BOARD OF DIRECTORS AND CORPORATE GOVERNANCE

The Board of Directors at Yukon Energy oversees the conduct of business and supervises the President and Chief Executive Officer, who is, in turn, responsible for the day-to-day operations at Yukon Energy along with the senior management team. The board models its approach to corporate governance on best practices in Canada and abroad, as reflected in the advice and recommendations of bodies such as the Conference Board of Canada.

## Board of Directors' Appointments

Section 3(1) of the *Yukon Development Corporation Act Regulations* (OIC 1993/108) sets out the process for being appointed to the Yukon Energy board. The board of the Yukon Development Corporation (YDC) is appointed by the Yukon government and in turn the YDC board appoints the board of Yukon Energy.

Four new people joined Yukon Energy's Board in 2010. We welcome the new Chair, Piers McDonald, along with board members Justin Ferbey, Judy Gingell and Diane Lister. Jason Bilsky will join the board in January 2011. Our other board members are Pat Irvin, Paul Birckel and Luke Johnson.

## Remuneration

Remuneration for Yukon Energy board members has been benchmarked against two Conference Board of Canada reports entitled *Compensation of Boards of Directors 2003* and *Compensation of Board of Directors 2005*. Yukon Energy's

board remuneration has also been benchmarked against the Conference Board's report *Board Practices in Crown Corporations 2008*.

The board chair is paid \$400 per half day meeting (four hours or less) and \$800 for a full day meeting (more than four hours). In addition, he is paid for a full day (\$800) to prepare for each board meeting.

Board members receive \$200 per half day meeting, and \$400 per full day meeting, plus they receive a full day's remuneration (\$400) for meeting prep time.

There are three committees that fall under Yukon Energy's board: the Audit, Governance and Human Resources Committees. Committee chairs are paid \$300 per half day meeting and \$600 per full day meeting, with one day (\$600) of prep time per committee meeting.

Committee members receive \$200 per half day meeting and \$400 per full day meeting. They do not receive remuneration for prep time.

## Code of Conduct

Yukon Energy has a Code of Conduct to which all board members are expected to adhere. A copy of the policy can be found on our web site at [yukonenergy.ca/about/profile/board/](http://yukonenergy.ca/about/profile/board/).

## ATIPP Legislation

Yukon Energy is now subject to the Yukon government's *Access to Information and Protection of Privacy Act*. The legislation is intended to

protect the privacy of individuals who provide information to government. It also offers the public a formal method for requesting information if they are denied access to it by an organization and, as such, is a method used once other informal avenues have been exhausted.

Openness and transparency are important to Yukon Energy and as a result, we already provide a great deal of information on our website. More information about the Corporation can be found on the Yukon Utilities Board, Yukon Environmental and Socio-economic Assessment Board and the Yukon Water Board websites.

## SENIOR MANAGEMENT

**David Morrison**  
President and C.E.O.

**Hector Campbell**  
Director, Resource Planning  
& Regulatory Affairs

**Linda Greer**  
Director, Human Resources  
& Information Management

**Lawrence Joudry**  
Director, Engineering Services

**Ed Mollard**  
Chief Financial Officer

**Leo Poile**  
Director, Operations

**Shelley Dixon**  
Corporate Secretary



# MANAGEMENT DISCUSSION AND ANALYSIS

The Management Discussion & Analysis (MD&A) reports on the financial results of the Corporation for the year ended December 31, 2010. It should be read in conjunction with the audited financial statements and notes that accompany this report.

As a territorial-owned corporation, Yukon Energy's mandate is to provide for a continuous supply of electricity to meet the energy needs of consumers in Yukon. Yukon grids are not connected to other jurisdictions and Yukon Energy is the prime generator and transmitter of electrical energy in the territory.

## Financial Overview

Net income from all sources in 2010 was \$4.8 million (2009—\$4.1 million) which translates to a regulatory return on equity of 7.5 percent (2009 – 7.9 percent). Analysis of these results by income statement category follows.

### REVENUE

Revenue from electricity sales totaled \$32.2 million (2009—\$31.5 million). Wholesale sales, representing about 79 percent of sales volumes, was about \$23.3 million of the total, a 4.5 percent increase over 2009. Part of this increase was due to colder weather experienced in Yukon in late 2010. As well,

Yukon Electrical Corporation Ltd.'s Fish Lake Hydro Unit #1 was down, necessitating increased Yukon Energy sales.

Also of note, in September Yukon Energy suspended sales to secondary sales class customers due to low water conditions in our reservoirs. This suspension remains in place in 2011.

While not a material impact on sales in 2010, Yukon Energy added a second industrial customer to our sales mix late in 2009. Alexco Resource Corporation began commercial mining and milling operations at their Bellekeno property northeast of Mayo. The mill is being serviced by a newly constructed substation, paid for by the customer.

### EXPENSES

Despite ongoing upward pressure on costs throughout the period, management was successful at bringing most cost categories in under budget for 2010. One notable exception was generation fuel. Both the north and south grids experienced colder than expected weather, driving the requirement for 2.3 GWh of diesel generation in December alone. As well, icing downstream of the Mayo hydro plant near the Village of Mayo required operators to delimit the output of this plant for much of December.



Stringing line for the Carmacks—  
Stewart Transmission Project Stage 2.

Photo: archbould.com

## CAPITAL

The 2010 capital program continued where 2009 left off in terms of aggressive pursuit of reliability issues as well as investigations into new supply and demand side options. Stage 2 of the Carmacks—Stewart Crossing transmission project that will join the north and south grids was well advanced during 2010. Substation construction and commissioning will occur on this project in the first half of 2011.

Field work on the Mayo hydro enhancement project also began in 2010 with the majority of required civil works completed during the 2010 building season. This project is scheduled to be in-service by the end of 2011. Together these two projects represent \$160 million in construction activity and are jointly funded by the Federal government through the Green Infrastructure Fund (\$71 million) and the Yukon government (\$52.5 million).

## Outlook

2011 will present a number of financial and operational challenges to the Corporation. Fiscal restraint will be a key priority, while at the same time efforts to improve reliability of service to our customers will be at the forefront for all employees.

Looking forward, management is updating its 20-year resource plan, incorporating the public input that will be gathered at the energy charrette planned for the spring of 2011.

Finding clean, affordable, reliable energy solutions for these same Yukoners will be a company focus for many years to come.

## International Financial Reporting Standards

In early 2008, the Accounting Standards Board announced that publicly accountable entities will be required to prepare financial statements in accordance with International Financial Reporting Standards (IFRS) for annual periods in fiscal years beginning on or after January 1, 2011. During 2010, the Standards Board agreed to allow a one year extension to this deadline for entities subject to cost-of-service based rate regulation. Yukon Energy meets this criterion and has chosen to defer implementation to January 1, 2012.

The Corporation hired an advisor experienced with IFRS to assist in developing and executing a conversion to ensure that differences between Canadian Generally Accepted Accounting Principles (GAAP) and IFRS that affect Yukon Energy were identified and that any required changes to accounting processes and controls (including information technology systems) could be made in a timely manner. Yukon Energy has a project manager leading the conversion to IFRS who is working with the advisor and senior management to execute the plan.

## Significant accounting impacts of conversion to IFRS

A number of differences between Canadian GAAP and IFRS have been identified that are expected to have a significant impact on Yukon Energy's financial statements. The Corporation is currently in the process of identifying and quantifying these differences in order to prepare an opening balance sheet under IFRS as of January 1, 2011. The main areas that are expected to have a significant impact on Yukon Energy are:

- rate regulated assets and liabilities;
- property plant and equipment;
- provisions (e.g. asset retirement obligations);
- employee future benefits; and
- IFRS 1 – first time adoption of International Financial Reporting Standards.

Through 2011, the IFRS team will work through the affected topics and develop position papers on the expected accounting treatment under IFRS. These will be reviewed by senior management and our external auditors prior to finalization with the Board of Directors. As well, these impacts will also be reviewed by the Yukon Utilities Board at the Corporation's next rate hearing.



## FINANCIAL STATEMENTS

December 31, 2010

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## Management's Responsibility for Financial Reporting

Management is responsible for the preparation of the financial statements and all other financial information relating to the Corporation contained in this annual report. The financial statements have been prepared in conformity with Canadian generally accepted accounting principles using methods appropriate for the industry in which the Corporation operates and necessarily include some amounts that are based on informed judgments and best estimates of management. The financial information contained elsewhere in the annual report is consistent with that in the financial statements.

Management has established internal accounting control systems to meet its responsibilities for reliable and accurate reporting. These systems include policies and procedures, the careful selection and training of qualified personnel and an organizational structure that provides for the appropriate delegation of authority and segregation of responsibilities.

The Board of Directors, through its Audit Committee, oversees management's responsibilities for financial reporting. The Audit Committee meets regularly with management and the independent auditor to discuss auditing and financial matters to assure that management is carrying out its responsibilities and to review the financial statements. The auditors have full and free access to the Audit Committee and management.



David Morrison,  
President and CEO



Ed Mollard  
Chief Financial Officer

May 11, 2011



Auditor General of Canada  
Vérificatrice générale du Canada

## INDEPENDENT AUDITOR'S REPORT

To the Board of Directors of the Yukon Energy Corporation

### Report on the Financial Statements

I have audited the accompanying financial statements of Yukon Energy Corporation, which comprise the balance sheet as at 31 December 2010, and the statement of operations, comprehensive income and retained earnings and statement of cash flows for the year then ended, and a summary of significant accounting policies and other explanatory information.

#### *Management's Responsibility for the Financial Statements*

Management is responsible for the preparation and fair presentation of these financial statements in accordance with Canadian generally accepted accounting principles, and for such internal control as management determines is necessary to enable the preparation of financial statements that are free from material misstatement, whether due to fraud or error.

#### *Auditor's Responsibility*

My responsibility is to express an opinion on these financial statements based on my audit. I conducted my audit in accordance with Canadian generally accepted auditing standards. Those standards require that I comply with ethical requirements and plan and perform the audit to obtain reasonable assurance about whether the financial statements are free from material misstatement.

An audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the financial statements. The procedures selected depend on the auditor's judgment, including the assessment of the risks of material misstatement of the financial statements, whether due to fraud or error. In making those risk assessments, the auditor considers internal control relevant to the entity's preparation and fair presentation of the financial statements in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the entity's internal control. An audit also includes evaluating the appropriateness of accounting policies used and the reasonableness of accounting estimates made by management, as well as evaluating the overall presentation of the financial statements.

I believe that the audit evidence I have obtained is sufficient and appropriate to provide a basis for my audit opinion.

### *Opinion*

In my opinion, the financial statements present fairly, in all material respects, the financial position of Yukon Energy Corporation as at 31 December 2010, and the results of its operations and its cash flows for the year then ended in accordance with Canadian generally accepted accounting principles.

### Report on Other Legal and Regulatory Requirements

In my opinion, the transactions of Yukon Energy Corporation that have come to my notice during my audit of the financial statements have, in all significant respects, been in accordance with the *Public Utilities Act* and regulations, the *Business Corporations Act* and regulations and the articles and by-laws of Yukon Energy Corporation.

Sheila Fraser, FCA  
Auditor General of Canada

11 May 2011  
Vancouver, Canada

## Yukon Energy Corporation

### Balance Sheet

(in thousands of dollars)

As at December 31,	2010	2009
<b>Assets</b>		
<b>Current</b>		
Cash	\$ 25,847	\$ 10,731
Accounts receivable (Note 4)	29,242	9,710
Materials and supplies	2,648	2,715
Prepaid expenses	368	394
	<b>58,105</b>	<b>23,550</b>
Customer contribution financing (Note 5 and 24)	17,424	17,424
Deferred uninsured losses (Note 6)	432	111
Diesel contingency fund (Note 7)	891	887
Property, plant and equipment (Note 8)	287,350	212,918
Deferred charges and intangible assets (Note 9)	18,963	13,451
	<b>\$ 383,165</b>	<b>\$ 268,341</b>
<b>Liabilities</b>		
<b>Current</b>		
Accounts payable and accrued liabilities (Note 10)	\$ 16,859	\$ 6,616
Construction Financing (Note 11)	47,500	25,000
Current portion of long-term debt (Note 14 and 24)	3,864	3,783
	<b>68,223</b>	<b>35,399</b>
Faro mine dewatering deferral revenue (Note 12)	397	397
Long-term pension liability (Note 19)	1,035	1,036
Contributions in aid of construction (Note 13)	140,686	59,316
Regulatory provision for future removal and site restoration costs	4,764	5,008
Diesel contingency fund (Note 7)	891	887
Long-term debt (Note 14 and 24)	101,449	105,355
	<b>317,445</b>	<b>207,398</b>
<b>Shareholder's Equity</b>		
<b>Share capital</b>		
Authorized: Unlimited number of a single class of shares with no par value		
Issued: 3,900 shares	39,000	39,000
<b>Retained earnings</b>	<b>26,720</b>	<b>21,943</b>
	<b>65,720</b>	<b>60,943</b>
	<b>\$ 383,165</b>	<b>\$ 268,341</b>

### Commitments and Contingencies (Notes 20 and 21)

The accompanying notes are an integral part of the financial statements.

### Approved by the Board

 , Chair

 , Director



## Yukon Energy Corporation

### Statement of Operations, Comprehensive Income and Retained Earnings (in thousands of dollars)

For the year ended December 31,	2010	2009
<b>Revenue</b>		
Sales of power (Note 15)	\$ 32,178	\$ 31,547
Other	476	866
	<b>32,654</b>	32,413
<b>Operating expenses</b>		
Administration (Note 16)	7,938	8,016
Operations and maintenance (Note 17)	7,899	7,597
Amortization of property, plant and equipment	5,657	5,427
Amortization of deferred charges	860	1,630
Amortization of intangible assets	548	505
	<b>22,902</b>	23,175
<b>Income from operations</b>	<b>9,752</b>	9,238
<b>Other income</b>		
Allowance for funds used during construction	514	392
Amortization of capital assistance	378	378
Interest income	1,238	1,165
	<b>2,130</b>	1,935
<b>Other expenses</b>		
Interest on borrowings	7,005	6,894
Provision for uninsured losses (Note 6)	100	150
	<b>7,105</b>	7,044
<b>Net income</b>	<b>4,777</b>	4,129
<b>Other comprehensive income</b>	-	-
<b>Comprehensive income</b>	<b>4,777</b>	4,129
<b>Retained earnings, beginning of year</b>	<b>21,943</b>	21,777
<b>Dividend</b>	-	(3,963)
<b>Retained earnings, end of year</b>	<b>\$ 26,720</b>	\$ 21,943

The accompanying notes are an integral part of the financial statements.

**Yukon Energy Corporation**  
**Statement of Cash Flows**  
(in thousands of dollars)

For the year ended December 31,	2010	2009
<b>Operating activities</b>		
Cash receipts from customers	\$ 32,679	\$ 31,958
Cash paid to employees and suppliers	(5,923)	(18,378)
Interest paid	(7,005)	(6,894)
Interest received	1,616	1,543
Cash provided by operating activities	<b>21,367</b>	8,229
<b>Financing activities</b>		
Repayment of long-term debt	(4,139)	(4,532)
Proceeds (repayment) of short-term financing	(25,000)	25,000
Proceeds from construction financing	47,500	-
Contributions in aid of construction	61,813	1,552
Cash provided by financing activities	<b>80,174</b>	22,020
<b>Investing activities</b>		
Additions to property, plant and equipment	(79,505)	(18,283)
Additions to deferred charges and intangible assets	(6,920)	(4,984)
Payments from long-term receivable	-	495
Cash used in investment activities	<b>(86,425)</b>	(22,772)
<b>Net increase in cash</b>	<b>15,116</b>	7,477
<b>Cash, beginning of year</b>	<b>10,731</b>	3,254
<b>Cash end of year</b>	<b>\$ 25,847</b>	\$ 10,731

The accompanying notes are an integral part of the financial statements.

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## Yukon Energy Corporation

### Notes to Financial Statements

(tabular amounts in thousands of dollars)

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December 31, 2010

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#### 1. NATURE OF OPERATIONS

Yukon Energy Corporation (the "Utility") is incorporated under the *Yukon Business Corporations Act* and is a wholly-owned subsidiary of Yukon Development Corporation (YDC), a corporation owned by the Government of Yukon (YG). Yukon Energy Corporation generates, transmits, distributes and sells electrical energy in the Yukon. The Utility is not subject to income taxes.

The Utility is subject to overall regulation by the Yukon Utilities Board ("YUB") and specific regulation by the Yukon Territory Water Board. Both boards are independent from the Utility.

##### Rate regulation

All operations of the Utility are regulated by the YUB pursuant to the *Public Utilities Act*. There is no minimum requirement for the Utility to appear before the YUB to review rates. However, the Utility is not permitted to charge any rate for the supply of power that is not approved by an Order of the YUB. The Utility is subject to a cost of service regulatory mechanism under which the YUB establishes the revenues required (i) to recover the forecast operating costs, including depreciation and amortization, of providing the regulated service, and (ii) to provide a fair and reasonable return on utility investment in rate base. As actual operating conditions may vary from forecast, actual returns achieved can differ from approved returns.

The regulatory hearing process used to establish or change rates typically begins when the Utility makes an application for its proposed electricity rate changes over the next one or two forecast years. The YUB must ensure that its decision, which fixes electricity rates, complies with appropriate principals of rate making, all relevant legislation including the *Public Utilities Act* and directives issued by the Yukon Government through Orders-In-Council that specify how the interests of the customer and Utility are to be balanced.

The YUB typically follows a two-stage decision process. In the first stage, the total costs that the Utility will incur to provide electricity to its customers over the immediate future are reviewed and approved. The approval of these costs determines the total revenues the Utility is allowed to collect from its customers. It is the responsibility of the YUB to examine the legitimacy of three classes of costs:

- the costs to the Utility to run its operations and maintain its equipment (personnel and materials);
- the cost associated with the amortization of all capital equipment; and
- the return on rate base (the borrowing costs related to borrowing that portion of the rate base which is financed with debt plus the costs to provide a reasonable rate of return on that portion of the rate base which is financed with equity).

As well, in the first stage, the YUB reviews the addition of costs to the rate base and assesses these costs to ensure they are prudent.

In the second stage, the YUB approves how the revenue will be raised. This stage essentially determines the electricity rates for the various customer classes in the Yukon: residential, government, commercial and industrial. This process is guided mainly by requirements of Yukon Government Order-in-Council 1995/90 and can include a cost-of-service study which allocates the overall utility's cost of service to the various customer classes on the basis of appropriate costing principles.

Normally, the Utility applies for rates in advance of the applicable years. The last rate application was filed for the 2008 and 2009 forecast years.



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## Yukon Energy Corporation

### Notes to Financial Statements (tabular amounts in thousands of dollars)

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December 31, 2010

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#### 1. NATURE OF OPERATIONS - continued

##### **Water regulation**

The Yukon Territory Water Board pursuant to the *Yukon Waters Act* decides if and for how long the Utility will have a water license for the purposes of operating hydro generation stations in the Yukon. The licenses will also indicate terms and conditions for the operation of these facilities.

##### **Capital structure**

The Utility's policy is to maintain a capital structure of 60% debt and 40% equity at year end. Annual dividends are declared to the parent and typically loaned back in order to maintain this ratio.

#### 2. SIGNIFICANT ACCOUNTING POLICIES

##### **Financial statement presentation**

The financial statements of the Utility have been prepared by management. They conform to Canadian generally accepted accounting principles ("GAAP") and take into account generally accepted methods and practices of regulated bodies. The regulatory accounting policies adopted by the Utility differ from the accounting policies prescribed by using GAAP. In particular, the timing of the Utility's recognition of certain assets, liabilities, revenues and expenses as a result of regulation differ from that of a non-regulated enterprise. The impact on the financial statements of accounting for rate regulated operations are further described in Note 3. The significant accounting policies have been classified accordingly in the notes below:

##### **Rate regulated accounting policies**

###### **Property, plant and equipment**

Property, plant and equipment include an allowance for funds used during construction ("AFUDC") calculated at the weighted average cost of capital which was 7.09% for 2010 (2009 - 7.61%). Upon retirement or disposal, any gain or loss is charged to income in the current year for assets amortized on an individual basis, or charged to accumulated amortization for assets amortized on a pooled basis.

###### **Faro mine dewatering deferral revenue**

Faro mine dewatering deferral revenue represents amounts ordered by the YUB to be held by the Utility on behalf of ratepayers. The YUB has sole discretion to direct disposition of these funds, typically through refunds to customers or applied to ratepayer deficits.

###### **Deferred uninsured losses**

The Utility maintains a regulatory account for recording uninsured losses. An annual provision is approved by the YUB and collected through customer rates. Variances between the approved annual provision and actual costs incurred are deferred until the following general rate application or until a specific application is made to the YUB requesting recovery from or refund to customers.

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## Yukon Energy Corporation

### Notes to Financial Statements

(tabular amounts in thousands of dollars)

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December 31, 2010

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## 2. SIGNIFICANT ACCOUNTING POLICIES - continued

### Deferred charges

Deferred charges are recorded at cost less accumulated amortization.

All deferred charges are amortized to earnings on a straight-line basis over terms approved by the Yukon Utilities Board.

Cost of feasibility studies and infrastructure planning which did not result in a capital project are amortized over terms ranging between five and ten years.

IFRS costs are associated with the accounting conversion from Canadian Generally Accepted Accounting Principles to International Financial Reporting Standards.

Deferred customer service costs are amortized over twelve years.

The deferred hearing cost account is used to record the deferral of costs associated with preparation and defense of applications to the YUB. The periods of amortization range from 10 to 45 years.

### Regulatory provision for future removal and site restoration costs

The Utility maintains a provision for the future removal of property, plant and equipment and the costs of site restoration related to those assets. Per YUB Order 2005-12 no additional provision is permitted. This account provides for the costs of demolishing, dismantling, tearing down, or otherwise disposing of an asset and any site restoration costs, net of actual recoveries. This account is not used when the costs relate to an asset retirement obligation.

### Deferred insurance proceeds

Deferred insurance proceeds represents a gain on fire insurance proceeds received related to a fire at the Whitehorse Rapids Generating Station in 1997. The proceeds are being amortized to income on the same basis as the replacement assets.

### Diesel contingency fund

The Utility maintains an asset and an offsetting liability on behalf of ratepayers. The fund is used to reimburse costs associated with diesel generation required when there is not sufficient water for hydraulic generation to meet demand. The Utility is required to file an annual report with the YUB on the fund's activity.

### Generally Accepted Accounting Principles

#### Revenue recognition

All revenues are recognized in the period earned. Revenue from the sale of power is recognized based on cyclical meter readings. Sales of power includes an accrual for electricity deliveries not yet billed.

#### Materials and supplies

Diesel fuel, materials and supplies are recorded at the lesser of average cost and net realizable value. Obsolete materials and supplies are recorded at salvage value in the period when obsolescence is determined. Major spare parts are recorded in the Utility's books as property and equipment.

#### Property, plant and equipment

Property, plant and equipment is stated at cost, other than the AFUDC component which is recorded under rate regulated accounting. Cost includes materials, direct labour, a proportionate share of directly attributable administration overhead, and finance charges capitalized during construction, less accumulated amortization.

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## Yukon Energy Corporation

### Notes to Financial Statements

(tabular amounts in thousands of dollars)

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December 31, 2010

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#### 2. SIGNIFICANT ACCOUNTING POLICIES - continued

Amortization is based on the straight-line method over the estimated economic life of the assets as follows:

Generation	
Hydro-electric plants	30 to 65 years
Diesel plants	25 to 45 years
Wind Turbines	30 years
Transmission	40 to 50 years
Distribution	30 to 40 years
Buildings	20 to 40 years
Transportation	9 to 31 years
Other equipment	5 to 20 years

#### Asset retirement obligations

On an annual basis, the Utility identifies legal obligations associated with the retirement of tangible long-lived assets. Where a reasonable estimate of the fair value of these obligations can be determined, the total retirement costs are to be recorded as a liability at fair value, with a corresponding increase to property, plant and equipment.

The Utility has determined that it has tangible long-lived assets with associated future legal obligations for retirement. As the Utility anticipates using the assets for an indefinite period, the date of removal of these assets cannot be reasonably determined, and therefore an asset retirement obligation has not been recorded. When the timing and amount of the retirement can be reasonably estimated, an asset retirement obligation and the corresponding increase in property, plant and equipment asset will be recognized.

#### Contributions in aid of construction

Certain property, plant and equipment additions are made with the assistance of cash contributions from customers or capital assistance from the Utility's parent or Government. These contributions are deferred upon receipt and amortized to income on the same basis as the assets to which they relate. Amortization of contributions from customers is netted on the statement of operations against amortization expense while amortization of capital assistance from the parent is disclosed separately under Other income.

#### Deferred water licensing costs

Costs related to obtaining water license renewals are deferred and amortized to earnings on a straight-line basis over the term of the license. The Utility operates its hydro generation facilities under three separate water licenses, with terms ranging from 17 to 25 years. These costs are treated as intangible assets and are measured at initial cost and amortized over the life of the water license.



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## Yukon Energy Corporation

### Notes to Financial Statements

(tabular amounts in thousands of dollars)

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December 31, 2010

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## 2. SIGNIFICANT ACCOUNTING POLICIES - continued

### Employee pension plan

The Utility has a defined benefit pension plan which provides for pensions based on length of service and final average earnings. Employees joining the Utility after January 1, 2002 are not eligible to participate in the defined benefit plan. The cost of pension benefits is actuarially determined using the projected benefits method, prorated on service, and reflects management's best estimates of investment returns, wage and salary increases, and age at retirement. Adjustments resulting from the plan enhancements, actuarial gains and losses, and changes in assumptions are amortized over the expected average remaining service period of active employees. Pension costs include the current cost of service, amortization of past service benefits and plan enhancements, and actuarial gains and losses. Unrecognized gains and losses are amortized on a straight-line basis over the expected average remaining service period of active employees, which is currently 9 years. The transitional asset that arose when this policy was first applied is amortized over the average remaining service period of active employees expected to receive benefits under the benefit plan as of January 1, 2000. The expected return on plan assets is based on the fair value of these assets.

### Measurement uncertainty

The preparation of financial statements in accordance with Canadian GAAP requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities and disclosure of contingent assets and liabilities at the date of the financial statements and the reported amounts of revenues and expenses during the reporting period. This mainly affects revenue, accounts receivable, property, plant and equipment, asset retirement obligations, employee pension obligations and regulated assets and liabilities. Actual results could differ by a significant amount from these estimates.

Management's estimates and assumptions, especially those affecting the reported amounts of regulated assets and the Utility's ability to recover the cost of these assets through future rates, are subject to decisions of the Yukon Utilities Board as described in Note 3.

### Environmental liabilities

Environmental liabilities consist of the estimated costs related to the remediation of environmentally contaminated sites. The Utility will accrue a liability and record an expense, related to present or past activities of the Utility, when there is a legal obligation to remediate the contamination and the costs can be reasonably estimated. If the likelihood of the Utility's obligation to incur these costs is either not determinable or the costs cannot be reasonably estimated, the contingency is disclosed in the notes to the financial statements. The Utility reviews its estimates of future environmental liabilities on an ongoing basis as described in Note 21.

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## Yukon Energy Corporation

### Notes to Financial Statements (tabular amounts in thousands of dollars)

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December 31, 2010

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#### ACCOUNTING CHANGES

##### Future Accounting Changes

On February 13, 2008, the Canadian Accounting Standards Board of Canada (AcSB) confirmed the adoption of IFRS as issued by the International Accounting Standards Board (IASB) in place of Canadian Generally Accepted Accounting Principles (GAAP) effective January 1, 2011.

The IASB has undertaken a project to review and assess accounting for rate regulated assets and liabilities. The timeline for completion of this project is not currently known. On September 10, 2010 the AcSB approved an option to defer conversion to International Financial Reporting Standards (IFRS) for one year for rate-regulated entities. The Utility has opted to take this deferral option and will therefore continue to prepare financial statements in accordance with Part V of the Canadian Institute of Chartered Accountants (CICA) Handbook up to the period ending on December 31, 2011.

The Utility will continue to assess the IASB's deliberations on the project. At the same time, we are currently assessing, through consultation with our external experts, whether any of our regulatory accounts could be recognized under the current IFRS framework. If rate-regulated accounting were not permitted and none of our regulatory accounts were determined to fall under the current IFRS framework, the write-off of our regulatory assets and regulatory liabilities would result in a net reduction to retained earnings of approximately \$2.7 million as at December 31, 2010. Regulatory accounting affects the timing of the accounting recognition of costs, revenues, losses and gains. Therefore, to the extent that we may be unable to recognize regulatory assets and liabilities after implementing IFRS in 2012, our statement of operations may be impacted by a change in the timing of recognition of these amounts in our statement of operations.

## Yukon Energy Corporation

### Notes to Financial Statements

(tabular amounts in thousands of dollars)

December 31, 2010

### 3. FINANCIAL STATEMENT EFFECTS OF RATE REGULATION

Certain items in these financial statements are accounted for differently than they would be in the absence of rate regulation.

Where regulatory decisions dictate, the Utility defers certain costs or revenues as assets or liabilities on the balance sheet and records them as expenses or revenues on the statement of operations as it collects or refunds amounts through future customer rates. Any adjustments to these deferred amounts are recognized in income in the period that the YUB renders a subsequent decision.

Regulatory assets represent future costs associated with certain revenues, incurred in the current period or in prior periods, which are expected to be recovered from customers in future periods through the rate-setting process. Regulatory liabilities represent future reductions or limitations of increases in revenues associated with amounts that are expected to be refunded to customers as a result of the rate-setting process.

In the absence of rate regulation the Utility's net income would have decreased by \$7,295,000 in 2010 (2009 - decreased by \$4,199,000). The following describes each of the circumstances in which rate regulation affects the accounting for a transaction or event:

	2010	2009	Expected remaining recovery/settlement (years)	For 2010: In the absence of Rate Regulation the Utility's Net Income would have increased (decreased) by:
<b>Regulatory assets:</b>				
Deferred charges (Note 9), net book value				
Feasibility studies and infrastructure planning	\$ 11,463	\$ 6,200	5 to 10	\$ (5,263)
Deferred customer service costs	635	700	10	65
Hearing costs	1,635	1,074	10 to 45	(561)
Dam safety review	119	-	5	(119)
IFRS planning	434	255	Indeterminate	(179)
Deferred uninsured losses (Note 6)	432	111	Indeterminate	(321)
Diesel contingency fund (Note 7)	891	887	Indeterminate	(4)
	15,609	9,227		(6,382)
<b>Regulatory liabilities:</b>				
Faro mine dewatering deferral revenue (Note 12)	397	397	Indeterminate	-
Deferred insurance proceeds (Note 13)	6,816	7,086	25	(270)
Regulatory provision for future removal and site restoration costs	4,764	5,008	Indeterminate	(244)
Diesel contingency fund (Note 7)	891	887	Indeterminate	4
	12,868	13,378		\$ (510)
Net impact of assets and liabilities	\$ 2,741	\$ (4,151)		\$ (6,892)
Impact of other items through Income statement				
AFUDC				(514)
Fuel Price Adjustment				111
<b>Total effect</b>				<b>\$ (7,295)</b>



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## Yukon Energy Corporation

### Notes to Financial Statements (tabular amounts in thousands of dollars)

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December 31, 2010

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#### 3. FINANCIAL STATEMENT EFFECTS OF RATE REGULATION - continued

##### Regulatory assets

###### (a) Deferred charges

Deferred charges represent costs which have been deferred and are being amortized over various periods. In the absence of rate regulation, GAAP would require such costs to be recognized as expenses in the year incurred.

###### Feasibility studies and infrastructure planning

The Utility undertakes certain projects whose objective is to determine the feasibility of a range of solutions. While in progress, the costs of these feasibility projects are included in these accounts. As well, if the feasibility project determines there is not a viable solution, these projects are closed out and amortized to income over a prescribed number of years. These values are also included in the feasibility accounts. The cost of feasibility projects that result in a capital project are transferred to the cost of the resultant project. In the absence of rate regulation, expenses in 2010 would have been \$5,263,000 higher. (2009 - \$3,512,000 higher expenses)

###### Deferred customer service costs

The costs associated with negotiating terms of service with a new industrial customer. In the absence of rate regulation, expenses in 2010 would have been \$65,000 lower. (2009 - \$64,000 lower expenses)

###### Hearing costs

These costs are associated with the YUB regulatory proceedings. The costs consist primarily of various rate and project review proceedings. The Utility is directed to defer and amortize the costs over terms at the discretion of the YUB. In the absence of rate regulation, expenses in 2010 would have been \$561,000 higher. (2009 - \$274,000 lower expenses)

###### Dam safety review

The Utility has a program of conducting reviews of the safety of its dams in accordance with standards set by the Canadian Dam Association. External consultants are hired every five years with intermittent costs incurred in the interim periods. These costs are amortized over five years as approved by the Utility's 1991/92 General Rate Application and reconfirmed in YUB Order 2005-12 and YUB Order 2009-8. In the absence of rate regulation, expenses in 2010 would have been \$119,000 higher. (2009 - \$13,000 lower expenses)

###### IFRS planning

These costs are associated with the accounting conversion from Canadian Generally Accepted Accounting Principles to International Financial Reporting Standards. In the absence of rate regulation, expenses in 2010 would have been \$179,000 higher. (2009 - \$255,000 higher expenses)

###### (b) Diesel contingency fund

The Diesel contingency fund ("DCF") was established by YUB Order 1996-6 through the Negotiated Settlement process. The DCF is administered by the Utility on behalf of the YUB, and as such is recorded as an asset and a liability. The DCF attracts interest based upon short-term bond rates in which the Utility invests the funds. Any negative balance attracts interest at the lowest short-term borrowing rate available to the Utility through its line of credit.

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## Yukon Energy Corporation

### Notes to Financial Statements

(tabular amounts in thousands of dollars)

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December 31, 2010

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### 3. FINANCIAL STATEMENT EFFECTS OF RATE REGULATION - continued

#### (b) Diesel contingency fund - continued

Pursuant to YUB order 1996-6, the Utility from time to time is required to transfer amounts to or from the fund it maintains on behalf of ratepayers to reimburse the Utility for costs associated with diesel generation required when there is not sufficient water for hydraulic generation to meet demand. In the absence of regulation, GAAP would have required any interest earned or incurred to be included in the Utility's net income in the year in which they occurred. In the absence of rate regulation, the Utility's income and expenses in 2010 would have been higher by \$4,000 from interest earned on the DCF. (2009 - \$4,000 higher income and expenses)

#### (c) Deferred uninsured losses

The YUB has approved the use of a deferral account for uninsured damages and injuries as a means of self-insurance. The account is maintained through an annual provision approved by the YUB. In order to eliminate the deficit rate payers owed as a result of uninsured losses, the Utility was directed by YUB Order 2009-8 to record annual provision of \$100,000 in 2010 and each subsequent year. In the absence of rate regulation, GAAP would require costs to be expensed as incurred and, therefore, expenses in 2010 would have been higher by \$321,000 (2009 - \$32,000 lower expenses). The period over which the provision will be recovered is dependent on the magnitude of future actual losses incurred and cannot be estimated.

#### Regulatory liabilities

#### (d) Faro mine dewatering deferral revenue

As directed by YUB Order 1998-5, all revenues, less any incremental costs to provide the service, collected from the Faro Mine under Rate Schedule 34 (Faro Mine Firm Shutdown Power) prior to December 31, 2004, were deferred for the benefit of ratepayers pending direction from the YUB. YUB Order 2005-12 confirmed that effective January 1, 2005 the Faro minesite would be charged the General Service-Government rate so there will be no further increases to Faro mine dewatering deferral revenue account.

The period over which the remaining liability will be recognized as revenue for the benefit of ratepayers is dependent on future YUB Board orders and, therefore, cannot be estimated.

#### (e) Deferred insurance proceeds

The deferred insurance proceeds relates to a fire at the Whitehorse Rapids Generating Station in 1997 which, pursuant to YUB Order 2000-3, is being amortized to income at the same rate as the replacement assets. In the absence of rate regulation, GAAP would have required the gain to have been completely recognized as income in the year received. As a result, the Utility's net income in 2010 would have been lower by the amount of the amortization of \$270,000 (2009 - \$270,000 lower).

#### (f) Regulatory provision for future removal and site restoration costs

Pursuant to amortization rates approved by the YUB in the Utility's previous general rate applications the Utility has maintained a reserve for future removal and site restoration costs. As a result of the YUB Order 2005-12, effective January 1 2005, the Utility is required to maintain this reserve as a regulatory provision in addition to any asset retirement obligations. The provision is not to exceed the cumulative value of the provision at December 31, 2004 of \$5,757,000. YUB Order 2005-12 also directs the Utility to notify interveners and interested parties when the balance of the provision reaches \$2,000,000.

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## Yukon Energy Corporation

### Notes to Financial Statements

(tabular amounts in thousands of dollars)

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December 31, 2010

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#### 3. FINANCIAL STATEMENT EFFECTS OF RATE REGULATION - continued

##### (f) Regulatory provision for future removal and site restoration costs - continued

Costs of dismantling capital assets, including site remediation, will be applied to this regulatory liability if they do not otherwise relate to an asset retirement obligation. In a non-regulated industry, future removal and site restoration costs would be limited to asset retirement obligations, and the removal and site restoration costs would be expensed in the year incurred if they did not relate to an asset retirement obligation. In the absence of rate regulation, the Utility's 2010 expense would have been higher by the amount of actual removal and site restoration costs incurred in the year of \$244,000 (2009 expenses - \$160,000 higher).

The period over which the provision will be settled is dependent on the future costs of demolishing, dismantling, tearing down, or otherwise disposing of the asset, and site restoration net of actual recoveries, and is, therefore, indeterminate.

##### (g) Fuel price adjustment

OIC 1998/90 directs the YUB to permit the Utility to adjust electricity rates to reflect fluctuations in the price of diesel fuel. The amount by which actual fuel prices vary from the YUB approved rates is deferred and recovered from or refunded to customers in a future period.

In the absence of rate regulation, GAAP would require that actual diesel fuel expenses be included in the operating result of the year that they are incurred. In 2010, fuel expenses were deferred and consequently lower by \$111,000 (2009 fuel expense lower by \$133,000).

##### Other items affected by rate regulation

The Utility is required under the *Public Utilities Act* to obtain prior approval from the YUB before making changes to depreciation, amortization, and depletion rates and methods. The YUB permits an allowance for funds used during construction ("AFUDC"), based on the Utility's weighted average cost of capital, to be included in the rate base. AFUDC is also included in the cost of property, plant and equipment for financial reporting purposes, and is amortized over future periods as part of the total cost of the related asset, based on the expectation that amortization expense, including the AFUDC component, will be approved for inclusion in future customer rates. Since AFUDC includes not only a cost of debt component, but also a cost-of-equity component, it exceeds the amount allowed to be capitalized in similar circumstances in the absence of rate regulation. In the absence of rate regulation, revenue would be \$514,000 lower (2009 - \$392,000 lower).

It is the Utility's policy to charge to income, in the year of disposal, any gain or loss upon retirement or disposal of land or vehicles. As approved by the YUB, the gain or loss on all other property, plant and equipment is deferred and amortized over the expected life of the remaining pool of similar assets. In the absence of rate regulation, GAAP would require the gain or loss on the disposal or retirement of all property, plant and equipment to be included in income in the period of disposal or retirement.

The Utility's policy of maintaining a constant capital structure of 60% debt and 40% equity is reviewed by the YUB as part of the rate-setting process and in the determination of the return on rate base. In the absence of rate regulation, the Utility would determine the appropriate capital structure solely based on decisions by the Board of Directors of the Utility, which may differ from the current policy.

All amounts maintained as regulatory assets and liabilities are expected to be recovered or settled over the periods noted above. However, there are risks and uncertainties associated with the recovery or settlement related to potential future decisions of the regulator which could result in material adjustments to these assets and liabilities.

## Yukon Energy Corporation

### Notes to Financial Statements

(tabular amounts in thousands of dollars)

December 31, 2010

#### 4. ACCOUNTS RECEIVABLE

	2010	2009
Green Infrastructure Funding (Note 13)	\$ 22,757	\$ 3,200
Wholesale energy sales	3,015	2,761
Retail energy sales	2,963	1,537
Other	507	2,212
	<b>\$ 29,242</b>	<b>\$ 9,710</b>

#### 5. CUSTOMER CONTRIBUTION FINANCING

Under the terms of a Power Purchase Agreement with an industrial customer, the Utility has agreed to finance the cost of transmission assets built to serve the customer. Initial financing started November 22, 2008, the date the transmission line came into service. The financing is structured in two parts: a \$7.2 million contribution towards the cost of the main line expansion and \$10.8 million contribution for the cost of the 27 kilometre spur line to the mine for a total of \$18 million. The customer is obligated to make interest only payments on the outstanding debt until 2012. From 2012 to 2017, the customer is obligated to make blended principal and interest payments such that the debt is extinguished by November 2017. This repayment schedule is subject to verification of mine life based on assessment of available reserves. At the direction of the YUB, the collection risk on this instrument is borne by YDC. Accordingly, YDC has loaned cash in an amount equal to this receivable at substantially the same terms. The Utility has recorded this loan as long term debt (see Note 14) and, if the industrial customer defaults on their debt, the Utility is released from the obligation to re-pay YDC. Subsequent to year end this financing has been paid in full. (see Note 24)

#### 6. DEFERRED UNINSURED LOSSES

	2010	2009
Opening balance	\$ 111	\$ 556
Provision	(100)	(150)
Transfer from Regulatory liabilities (Note 12)	-	(413)
Losses incurred		
Asset replacements	421	118
Closing balance	<b>\$ 432</b>	<b>\$ 111</b>

YUB Order 2009-8 directed the Utility to charge \$100,000 to this provision starting in 2010.

#### 7. DIESEL CONTINGENCY FUND

	2010	2009
Opening balance	\$ 887	\$ 883
Interest	4	4
Closing balance	<b>\$ 891</b>	<b>\$ 887</b>

The annual return on investment for 2010 was 0.50% (2009 - 0.45%). The fair market value of these investments is equal to the carrying amount due to the short term maturity of the investments.



## Yukon Energy Corporation

### Notes to Financial Statements (tabular amounts in thousands of dollars)

December 31, 2010

#### 8. PROPERTY, PLANT AND EQUIPMENT

	Cost	Accumulated Amortization	2010 Net book Value	2009 Net book Value
Generation	\$ 148,508	\$ 57,245	\$ 91,263	\$ 87,679
Transmission	85,422	16,436	68,986	69,667
Distribution	27,422	8,303	19,119	19,954
Buildings and other equipment	19,540	7,469	12,071	11,383
Transportation	4,313	1,367	2,946	2,221
Land and land rights	1,114	-	1,114	1,116
Construction-in-progress	91,851	-	91,851	20,898
	<b>\$ 378,170</b>	<b>\$ 90,820</b>	<b>\$ 287,350</b>	<b>\$ 212,918</b>

Included in construction-in-progress is \$49.5 million for Mayo B and \$28.0 million for Carmacks Stewarts phase 2 projects.

#### 9. DEFERRED CHARGES AND INTANGIBLE ASSETS

	Cost	Accumulated Amortization	2010 Net book Value	2009 Net book Value
Intangible assets:				
Deferred water licensing costs	\$ 9,198	\$ 4,521	\$ 4,677	\$ 5,222
Deferred charges:				
Feasibility studies and infrastructure planning	13,900	2,437	11,463	6,200
IFRS planning	434	-	434	255
Hearing costs	3,804	2,169	1,635	1,074
Deferred customer service costs	769	134	635	700
Dam safety review	332	213	119	-
	<b>\$ 28,437</b>	<b>\$ 9,474</b>	<b>\$ 18,963</b>	<b>\$ 13,451</b>

#### 10. ACCOUNTS PAYABLE AND ACCRUED LIABILITIES

	2010	2009
Trade payables	\$ 16,263	\$ 5,945
Employee compensation	428	417
Other	168	254
	<b>\$ 16,859</b>	<b>\$ 6,616</b>

## Yukon Energy Corporation

### Notes to Financial Statements

(tabular amounts in thousands of dollars)

December 31, 2010

#### 11. CONSTRUCTION FINANCING

	2010	2009
Short-term financing	\$ -	\$ 25,000
Construction financing	47,500	-
	<b>\$ 47,500</b>	<b>\$ 25,000</b>

Construction financing balances at December 31, 2010 are monies advanced from the parent to assist in the development of Utility infrastructure, primarily the Carmacks Stewart Stage 2 and Mayo B Hydro Electric Project. This funding will remain in place until the projects are placed in service at which point the repayment terms will be renegotiated. The projects are scheduled to be completed by the end of fiscal 2011. Interest on this funding is based on the Bankers Acceptance rate on the date of the cash draw plus 50 basis points. Interest is payable annually at December 31 and at the maturity date.

#### 12. FARO MINE DEWATERING DEFERRAL REVENUE

	2010	2009
Faro mine dewatering deferral revenue account:		
Opening balance	\$ 397	\$ 1,191
Applied to revenue shortfall per YUB Order 2009-10	-	(381)
Offset to Deferred uninsured losses account per YUB Order 2009-8 (Note 6)	-	(413)
Closing balance	<b>\$ 397</b>	<b>\$ 397</b>

#### 13. CONTRIBUTIONS IN AID OF CONSTRUCTION

	Gross	Accumulated Amortization	2010 Net	2009 Net
Contributions from Canada (Note 4)	\$ 32,747	\$ -	\$ 32,747	\$ 3,200
Capital assistance from parent since 1998	68,312	2,476	65,836	13,714
Contributions from customers since 1998	38,098	3,475	34,623	34,608
Pre-1998 contributions	1,739	1,075	664	708
Deferred insurance proceeds	11,602	4,786	6,816	7,086
	<b>\$ 152,498</b>	<b>\$ 11,812</b>	<b>\$ 140,686</b>	<b>\$ 59,316</b>

The Utility has entered into a contribution agreement with the Government of Canada for Green Infrastructure Funding for Stage 2 of the Carmacks to Stewart Crossing Transmission Line and the Mayo B Hydro Enhancement projects. The Utility is entitled to reimbursement of 50% of eligible costs to a maximum of \$71 million during the period May 2009 to March 2012 subject to meeting structured reporting requirements.

The sources of contributions received prior to 1998 were not recorded separately.

## Yukon Energy Corporation

### Notes to Financial Statements (tabular amounts in thousands of dollars)

December 31, 2010

#### 14. LONG-TERM DEBT

The Utility's long-term debt is summarized as follows:

	2010	2009
<b>Yukon Development Corporation</b>		
\$40,000,000 flexible term note bearing interest at 7% repayable in annual installments of up to \$1,000,000 principal, plus accrued interest and secured by mortgage over specific assets	\$ 24,111	\$ 25,111
\$27,313,661 term note bearing interest at 5.88%, payable monthly, and semi-annual principal payments commencing June 30, 2007 and ending December 31, 2023. The note is unsecured.	20,887	22,494
\$18,000,000 flexible term note related to the Mayo to Dawson Transmission Line project bearing interest at 6.55% repayable in annual installments of \$450,000 principal, plus accrued interest with the balance of \$307,000 due December 31, 2043. The note is unsecured.	14,707	15,157
\$18,000,000 term note related to the Transmission Line Construction Financing, bearing interest at 6.50% repayable in variable monthly installments due December 2017	17,424	17,424
Unsecured advance bearing interest at 6.03%, due one year after demand	3,649	3,649
Unsecured advance bearing interest at 5.403%, due one year after demand	2,839	2,839
Unsecured advance bearing interest at 5.34%, due one year after demand	3,583	3,583
Unsecured advance bearing interest at 5.28%, due one year after demand	4,251	4,251
Unsecured advance bearing interest at 4.65%, due one year after demand	3,901	3,901
Unsecured advance bearing interest at 5.28%, due one year after demand	3,963	3,963
<b>TD Canada Trust</b>		
\$12,400,000 term note bearing interest at 7.81% payable in monthly installments of \$102,000 interest and principal, with the balance due September 30, 2016. The note is guaranteed by the Yukon Government.	5,724	6,472
<b>Carmacks Stewart First Nation Liability</b>		
Long-term liability payable to several First Nations related to the building of the Carmacks Stewart Transmission Line. These are non interest bearing, repayable in varying installments, due in 2028	274	294
	<b>105,313</b>	109,138
Less current portion	3,864	3,783
	<b>\$ 101,449</b>	\$ 105,355

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## Yukon Energy Corporation

### Notes to Financial Statements

(tabular amounts in thousands of dollars)

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December 31, 2010

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#### 14. LONG-TERM DEBT - continued

##### **\$40,000,000 Flexible term note**

The terms of the flexible term note provide for payments of principal and interest to be deferred and abated, respectively, if power sales on the Whitehorse-Aishihik-Faro electrical power distribution system are less than specified amounts. After adjusting for abated interest, the effective interest rate on this instrument for 2010 is 7.0% (2009 - 6.94%).

##### **Mayo to Dawson Transmission Line Financing**

The Utility obtained financing from YDC in the amount of \$18 million for a transmission line from the Mayo hydro generating station to Dawson City. The financing was obtained effective September 6, 2003, the date the transmission line came into service. The financing was made under terms that ensure that ratepayers are not paying more in any year than they would otherwise have paid if the transmission line had not been built and Dawson City had continued to be served by diesel generation. The maximum interest payable on the note in any year is determined by a formula which compares the costs and benefits of operating the line. For example, the costs include depreciation, return on equity, and operating and maintenance expense. The benefits include diesel fuel costs not incurred. As per the agreement, total costs, including interest, cannot exceed the benefits.

If the costs of operating the line exceed the benefits in any year, YDC will pay the Utility the difference on or before March 31 of the next calendar year.

In 2010, benefits exceeded costs, which resulted in \$993,000 in interest paid to YDC. (In 2009, benefits exceeded costs, which resulted in \$1,022,000 in interest paid to YDC).

##### **Unsecured Advances**

The Utility did not declare a dividend to YDC (2009 - \$3,963,000). The unsecured advances represent dividends which have been declared to YDC in prior years and lent back to the utility. Advances are unsecured and due one year after demand.

##### **Transmission Line Construction Financing**

The Utility obtained financing from YDC in the amount of \$18 million for an industrial customer's Capital Cost Contribution for the transmission line from Carmacks to Minto Landing and Spur line to the customer. Financing of \$16 million was obtained effective November 22, 2008, the date the transmission line came into service and an additional \$1.9 million was obtained in 2009 after final projects costs were known. The financing was made under terms that ensure that ratepayers are not paying more in any year than they would otherwise have paid if the transmission line had not been built. The Utility is obliged to repay the loan when payments are received from the customer under the Power Purchase Agreement. YDC assumes all the risk involved in this debt. (See Note 24)

##### **Long-term debt repayment**

Scheduled repayments for all long-term debt are as follows:

2011	3,864
2012	4,203
2013	7,093
2014	7,374
2015	7,676
Thereafter	75,103

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**\$ 105,313**

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## Yukon Energy Corporation

### Notes to Financial Statements

(tabular amounts in thousands of dollars)

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December 31, 2010

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#### 14. LONG-TERM DEBT - continued

##### Fair value

Fair value at December 31, 2010 of \$124 million (2009 - \$118 million) for all long-term debt including current portions was estimated using discounted cash flows based on an estimate of the Utility's current borrowing rate for similar borrowing arrangements.

#### 15. SALES OF POWER

	2010	2009
Wholesale	\$ 23,301	\$ 22,291
General Service	3,315	3,007
Industrial	3,311	3,191
Residential	1,524	1,535
Secondary Sales	644	1,442
Sentinal and Street Lights	83	81
	<b>\$ 32,178</b>	<b>\$ 31,547</b>

#### 16. ADMINISTRATION EXPENSES

	2010	2009
Wages and benefits	\$ 3,811	\$ 3,723
Insurance and taxes	1,078	1,075
General office	994	1,132
Information systems	733	776
Training, recruitment and development	546	539
Environmental	298	237
Intercompany services	252	302
Board of Directors	87	113
Material management and contracting	81	54
Regulatory loss	58	65
	<b>\$ 7,938</b>	<b>\$ 8,016</b>

## Yukon Energy Corporation

### Notes to Financial Statements

(tabular amounts in thousands of dollars)

December 31, 2010

#### 17. OPERATIONS AND MAINTENANCE EXPENSES

	2010	2009
Wages and benefits	\$ 3,923	\$ 3,939
Maintenance		
- hydro, diesel and wind	1,031	762
- building and vehicle	1,011	1,002
- lines and substations	587	869
Fuel	1,189	870
Water level measurement	158	155
	<b>\$ 7,899</b>	<b>\$ 7,597</b>

#### 18. RELATED PARTY TRANSACTIONS

The Utility is related in terms of common ownership to all Government of Yukon (YG) departments, agencies and Crown Corporations. Transactions are entered into in the normal course of operations with these entities. All transactions are recorded at the rates set out by the YUB.

Revenue from related parties is included in other revenue on the statement of operations. Interim Electrical Rebate program revenues are received from YDC in accordance with terms established by YG which established the program to protect certain ratepayers by minimizing the impact of rate increases. These revenues are included in the sales of power on the statement of operations.

The following table summarizes the Utility's related party transactions for the year:

	2010	2009
<b>Revenue</b>		
Sales of service to YDC	\$ 236	\$ 301
Program cost reimbursement from YG	109	140
Rate subsidy received from YDC	246	226
<b>Operating expenses</b>		
Payment of interest on borrowings from YDC	\$ 6,472	\$ 6,299
Payment for financial information system usage to YDC	-	147
<b>Other receipts</b>		
Capital Contributions from YDC	\$ 53,417	\$ 2,833
Construction Financing from YDC	47,500	-
Advance from YG	-	25,000
<b>Other payments</b>		
Payment of dividend to YDC	\$ -	\$ 3,963

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## Yukon Energy Corporation

### Notes to Financial Statements (tabular amounts in thousands of dollars)

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December 31, 2010

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#### 18. RELATED PARTY TRANSACTIONS - continue

At the end of the year, the amounts receivable from and due to related entities are as follows:

	2010	2009
YDC		
Accounts receivable	\$ 233	\$ 2,045
Accounts payable	\$ 110	\$ 109
Construction Financing (Note 11)	\$ 47,500	\$ 25,000
Current portion of long-term debt	\$ 3,056	\$ 3,035
Long-term debt	\$ 96,258	\$ 99,074
YG		
Accounts receivable	\$ 152	\$ 210

These balances are non-interest bearing and payable on demand except for long-term debt and Construction Financing (Note 11 and 14).

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## Yukon Energy Corporation

### Notes to Financial Statements

(tabular amounts in thousands of dollars)

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December 31, 2010

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#### 19. PENSION COSTS AND OBLIGATIONS

The Utility sponsors a defined benefit pension plan which provides benefits based on length of service and final average earnings as follows:

- years of pensionable service;
- the average annual earnings during any five consecutive years of pensionable service where earnings are the highest; and
- the average of the years maximum pensionable earnings (Canada Pension Plan) for the same five year period.

Annual cost of living increases to a maximum of 3.0% are provided to pensioners. The Utility contributes amounts as recommended by an independent actuary.

Employees make contributions to the plan as follows:

- 3.5% of earnings up to the year's maximum pensionable earnings; and
- 5.0% of earnings in excess of the year's maximum pensionable earnings.

The Utility has contracted with external organizations to provide services of trustee, administrator and investment manager for the pension plan.

An actuarial valuation for funding purposes was performed as of January 1, 2010 by the consulting actuarial firm AON Consulting Inc. The next valuation for funding purposes will be conducted as of January 1, 2013. The pension costs and obligations were based on the data used in the January 1, 2010 funding valuation and have been projected to December 31, 2010 in accordance with generally accepted actuarial standards.

The fair value of the plan assets is based on market values as reported by Group Retirement Services, the plan's custodian as at December 31, 2010. The plan assets are invested in a pooled balanced fund. The distribution of assets by major asset class is as follows:

	December 31, 2010	December 31, 2009
Equities	53.1%	51.4%
Fixed Income Securities	37.9%	39.5%
Real Estate	9.0%	9.1%



## Yukon Energy Corporation

### Notes to Financial Statements (tabular amounts in thousands of dollars)

December 31, 2010

#### 19. PENSION COSTS AND OBLIGATIONS - continue

Information about the Utility's defined benefit plan as at December 31, in aggregate, is as follows:

	2010	2009
Discount rate-accrued benefit obligation	5.75%	6.25%
Discount rate-benefit costs	6.25%	6.25%
Expected long-term rate of return on plan assets	6.50%	6.50%
Assumed rate of salary escalation	3.00%	3.00%
Assumed rate of pension indexing	2.00%	2.50%
Expected average remaining service period of active employees	9 years	12 years
Benefit obligation determined by actuarial valuation	\$ 11,100	\$ 10,491
Fair value of plan assets	8,902	7,751
Plan deficit	\$ 2,198	\$ 2,740
Unrecognised amount:		
- transitional asset	119	135
- net actuarial losses	(1,143)	(1,703)
Accrued benefit liability	\$ 1,174	\$ 1,172
Current portion of accrued benefit liability	\$ 139	\$ 136
Long-term portion of accrued benefit liability	1,035	1,036
Accrued benefit liability	\$ 1,174	\$ 1,172
Pension expense	\$ 507	\$ 584
Employer contributions	\$ 392	\$ 345
Employee contributions	\$ 121	\$ 112
Benefits paid	\$ 132	\$ 132

The accrued benefit liability has been recorded by the Utility and its current portion of \$139,000 (2009 - \$136,000) is included in accounts payable and accrued liabilities on the balance sheet.

Employees joining the Utility after January 1, 2002 are not eligible to participate in the defined benefit plan. The Utility makes contributions to a Registered Retirement Savings Plan ("RRSP") on behalf of these employees and employees hired before January 1, 2002 who belonged to the defined benefit plan and elected to opt out of that plan. The RRSP is a defined contribution plan. The costs recognized for the period are equal to the Utility's contribution to the plan. During 2010, these were \$289,000 (2009 - \$256,000).

Total cash payments for employee future benefits for 2010, consisting of cash contributed by the Utility to its funded defined benefit pension plan and cash contributed directly to the RRSP were \$681,000 (2009 - \$601,000).

As at December 31, 2010, the Utility's defined benefit pension plan had 39 members (2009 - 39), and the RRSP had 56 members (2009 - 49).

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## Yukon Energy Corporation

### Notes to Financial Statements

(tabular amounts in thousands of dollars)

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December 31, 2010

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#### 20. COMMITMENTS

##### Aishihik water licence

The Yukon Territory Water Board issued a water use license in 2002, valid until December 31, 2019, for the Utility's Aishihik Lake facility. In addition to maintaining a minimum and maximum water level, this license commits the Utility to meet a number of future requirements including:

- a) annual payments of \$25,000 until 2011 for the purpose of construction and maintenance of a heritage camp and delivery of programs at the camp;
- b) Heritage Mitigation Plan. The Utility did not incur expenditures in 2010 on heritage projects and the amount to be expended in the future has not yet been determined; and
- c) annual fish monitoring programs.

Fish monitoring programs are also required under an authorization provided by the federal government Department of Fisheries and Oceans, which is valid until December 31, 2019. The costs of meeting these requirements are accounted for as water licence costs in the year they are paid.

##### Contractual obligations

The Utility has entered into contracts to purchase products or services for which the liability has not been incurred as at December 31, 2010 as the product or service had not been provided. The commitment at year end is \$89,963,000.

#### 21. ENVIRONMENTAL LIABILITIES

The Utility's activities are subject to various federal and territorial laws and regulations governing the protection of the environment or to minimize any adverse impact thereon. The Utility conducts its operations so as to protect public health and the environment and believes its operations are materially in compliance with all applicable laws and regulations.

The Utility has conducted environmental site assessments at all its diesel plant sites. At sites where environmental contamination was found and a legal obligation to remediate the site existed, the Utility has conducted a full remediation.

As at December 31, 2010 no new environmental liabilities, for which a legal obligation exists to remediate, have been identified by the Utility. The Utility will continue to use its Environmental Management System to monitor and assess previous and potential existing environmental liabilities on an ongoing basis.

#### 22. RISK MANAGEMENT AND FINANCIAL INSTRUMENTS

At December 31, 2010, the Utility's financial instruments included cash, accounts receivable, long-term receivable, accounts payable and accrued liabilities and long term debt. The fair value of cash, accounts receivable, accounts payable and accrued liabilities approximate their carrying value due to the immediate or short-term maturity of these financial instruments.

The long-term receivable related to the Transmission Line Construction Financing is accounted for at amortized cost using the effective interest rate method. The fair value of the long-term receivable as at December 31, 2010 is approximately \$19 million (2009 - \$18.7 million).

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## Yukon Energy Corporation

### Notes to Financial Statements (tabular amounts in thousands of dollars)

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December 31, 2010

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#### 22. RISK MANAGEMENT AND FINANCIAL INSTRUMENTS - continue

The long-term debt is accounted for at amortized cost using the effective interest rate method. The fair value of the long-term debt is estimated by discounting the future cash flows using current rates for debt instruments subject to similar risks and maturities as disclosed in Note 14.

The Utility also has access to a \$10 million line of credit. The account accrues interest on withdrawals at prime rate. The facility was not drawn on at year-end.

##### **Interest rate risk**

Interest rate risk is the risk that future cash flows or fair value of a financial instrument will fluctuate due to changes in market interest rates. The Utility is not exposed to significant interest rate risk due to its long-term debt having fixed interest rates.

##### **Credit risk**

Credit risk is the risk of failure of a debtor or counterparty to honour its contractual obligations resulting in financial loss to the Utility. The Utility's credit risk is minimal in that its primary customer is a regulated utility.

##### **Liquidity risk**

Liquidity risk is the risk that the Utility will not be able to meet its financial obligations as they fall due. The Utility's approach to managing liquidity is to ensure, as far as possible, that it will always have sufficient liquidity to meet its liabilities when due, under both normal and stressed conditions, without incurring unacceptable losses or risking damage to the Utility's reputation.

The Utility does not engage in hedging transactions.

#### 23. CAPITAL MANAGEMENT

The Utility's capital is its equity which is comprised of share capital and accumulated funds in the form of retained earnings. The Utility manages its equity by managing revenues, expenses, assets and liabilities to ensure the Utility effectively achieves its objectives while remaining a going concern.

The Utility monitors its capital on the basis of the ratio of total debt to total capitalization. Debt is calculated as total borrowings, which is comprised of long-term debt, including the portion of long-term debt due within one year. Short term debt related to assets under construction at the balance sheet date is excluded from the cost of debt calculation, as the assets are similarly excluded from the determination of rate base. Total capitalization is calculated as total debt plus total shareholder's equity as shown on the balance sheet. The Utility maintains a balance in retained earnings as an indicator of the Utility's equity position.

The Utility has a policy which defines its capital structure at a ratio of 60% debt and 40% equity. This policy has been reviewed and accepted by the YUB.

The long-term debt with YDC of \$17.424 million that relates to the Transmission Line Construction Financing is not included in this calculation. This long-term debt is linked with the long-term receivable from an industrial customer. The Utility bears no risk in holding this debt so the amount was removed from this calculation.

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## Yukon Energy Corporation

### Notes to Financial Statements

(tabular amounts in thousands of dollars)

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December 31, 2010

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#### 23. CAPITAL MANAGEMENT - continued

The table below summarizes the Utility's debt to total capitalization position:

(thousands of dollars)	2010	2009
Long-term debt due within one year	\$ 3,864	\$ 3,783
Long-term debt	101,449	105,355
Total Debt	105,313	109,138
Less debt related to the Transmission Line Construction Financing (Note 14)	17,424	17,424
Total debt to include in the calculation	\$ 87,889	\$ 91,714
Share capital	\$ 39,000	\$ 39,000
Retained earnings	26,720	21,943
Total equity	65,720	60,943
Total capitalization	\$ 153,609	\$ 152,657
Total debt to total capitalization	57 %	60 %

There were no changes in the Utility's approach to capital management during the period.

#### 24. SUBSEQUENT EVENTS

Under the terms of a Power Purchase Agreement with an industrial customer, the Utility had agreed to finance the cost of transmission assets built to serve the customer. On January 19, 2011 this financing was paid in full by the industrial customer. On the same day, the balance owing on the \$18,000,000 term note in the amount of \$17,424,304 with Yukon Development Corporation related to the Transmission Line Construction Financing was paid in full.

On January 1, 2011, the Utility entered into an agreement with Yukon Development Corporation to renegotiate terms of all outstanding debt, excluding the term note related to the transmission line financing, between the two companies in the amount of \$81,890,873. The term of the new loan is until December 31, 2015 with interest at 4.25%. Interest on the loan is payable on the last business day of each month. The Utility will pay \$3,000,000 against the outstanding principal annually on December 31 starting on December 30, 2011. The Utility will repay the outstanding principal balance in full by December 31, 2015, unless alternative repayment is negotiated by the parties in writing.

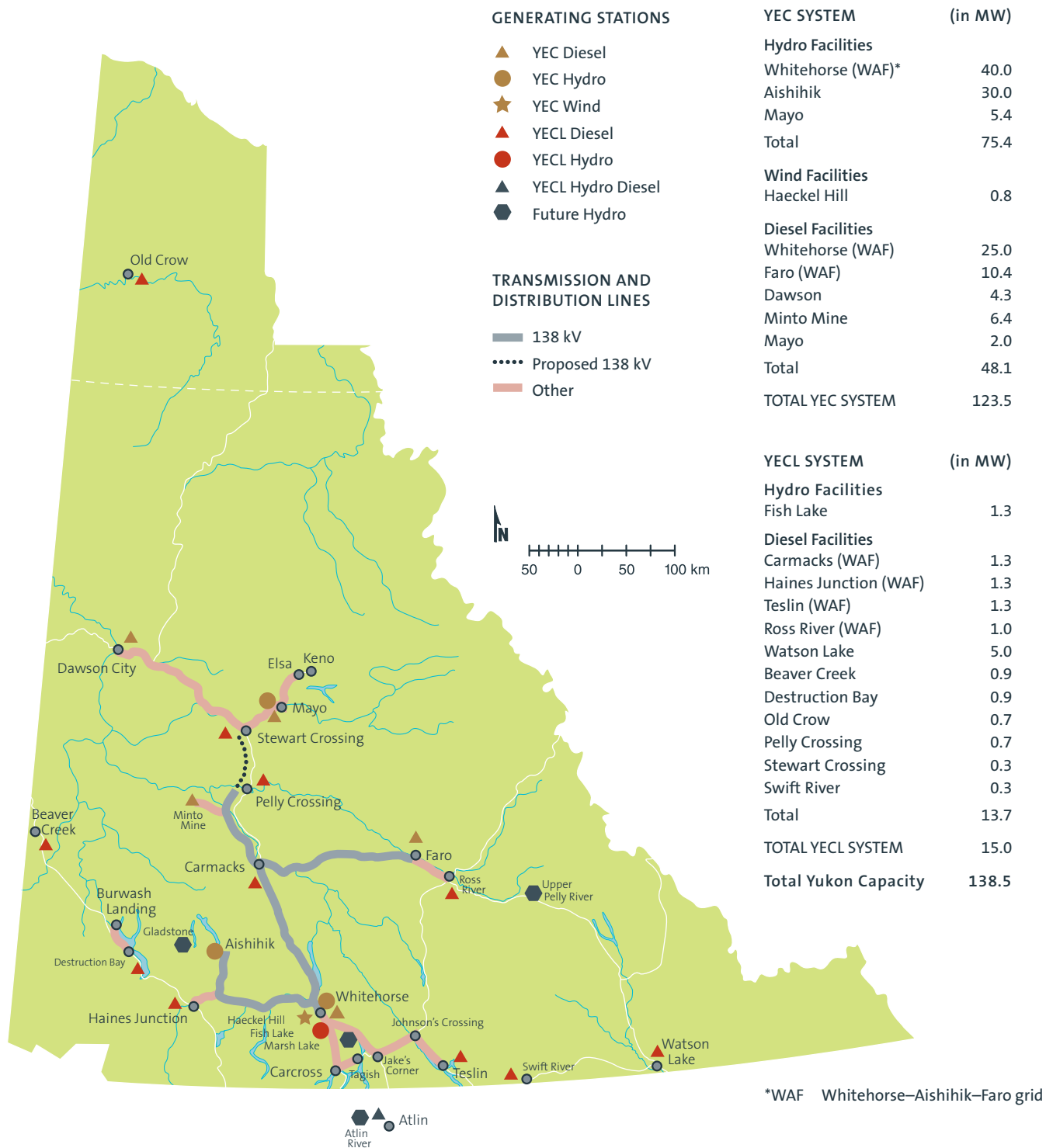
#### 25. COMPARATIVE FIGURES

Certain 2009 figures have been reclassified to conform with the current year's presentation.





# YUKON ENERGY TRANSMISSION AND GENERATION FACILITIES





**YUKON  
ENERGY**



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Cover: Underground at  
the Aishihik power plant,  
where a 3<sup>rd</sup> turbine is  
being installed.

Photo: [archbould.com](http://archbould.com)