SITE C CLEAN ENERGY PROJECT

MONTHLY FIELD STUDIES SUMMARY

May 2014

The Site C Clean Energy Project is currently undergoing a cooperative environmental assessment by the Canadian Environmental Assessment Agency and the B.C. Environmental Assessment Office. BC Hydro is continuing to conduct environmental and engineering field studies on and around the Peace River between the Williston Reservoir and the Alberta border to inform detailed mitigation and monitoring planning. Project construction will not take place unless Site C receives environmental certification, regulatory permits and authorizations, and approvals to proceed.

This notice provides a list of field work planned for May 2014. Helicopters may be required for some of this work. BC Hydro will obtain permits, and complete environmental management plans and archeological assessments as required.

Overview
Socio-economic Studies
• Forestry Site Inspections
Engineering Investigations
• Visual Inspections for Environmental and Archaeological Assessments
• South Bank Construction Access Road Site Inspections
• Instrumentation Monitoring
Wildlife Studies
• Amphibian Surveys
• Avian Surveys
• Jackfish Lake Moose and Elk Monitoring Program
Physical Environment Studies
• Peace River Turbidity and Suspended Sediment Monitoring
• Climate and Air Quality Monitoring

Current and previous field study activities are available at **www.sitecproject.com/news-and-information/field-study-notices** and in the Community Consultation offices in Fort St. John and in the Pearkes Centre in Hudson's Hope.

Regular and ongoing BC Hydro work may also be taking place on the Peace River and tributaries related to BC Hydro's Peace River water licence requirements or other operations work.

For further information, please contact:
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May 2014

Study Name	Description	Timing
Socio-Economic Studies – Forestry Site Inspections	BC Hydro will be conducting forestry site inspections of proposed clearing routes on the north and south banks of the Peace River at the proposed dam site, and Moberly River area between late April and October 2014. The work will include foresters walking or driving the proposed clearing routes to conduct visual surveys of the area to confirm topography and terrain, and may include taking measurements and photographs. Helicopters may also be used to access and assess the proposed clearing routes. Vehicles may be stopped on the side of the road where assessments are being conducted.	April – October 2014
Engineering Investigations – Visual Inspections for Environmental and Archaeological Assessments	BC Hydro is conducting visual inspections of the dam site area, including the right bank terrace and Septimus Siding, to assist with planning and permit preparations to support future field investigations. Work will include archaeological and environmental investigations and assessments of proposed work areas. Field crews will also be traversing the areas on foot. Work may include taking measurements and photographs.	May 2014
Engineering Investigations – South Bank Construction Access Road Site Inspections	BC Hydro is conducting site inspections of access roads required for construction on the south bank of the Peace River. These visual surveys will be happening on the petroleum development and forestry service roads north of the Jackfish Lake Road area, between the intersection with Highway 29 at Chetwynd and the proposed dam site. Work will include engineers walking or driving the potential access roads to conduct visual surveys of the area to confirm topography and terrain, and may include taking measurements and photographs. Worker vehicles may be parked on the side of the road where assessments are being conducted.	April – October 2014

May 2014

Study Name	Description	Timing
Engineering Investigations – Instrumentation Monitoring	BC Hydro is continuing instrumentation monitoring at the proposed dam site and along the reservoir shoreline. There are approximately 80 sites throughout the reservoir area where geotechnical instruments are installed. These sites are visited approximately every three to six months throughout the year for reading and maintenance. Access to the sites will be by vehicle, foot and helicopter. Snow removal may be required periodically to facilitate vehicle access to the sites.	February – October 2014
Wildlife Studies – Amphibian Surveys	BC Hydro is conducting additional amphibian surveys along existing petroleum access roads east of the Jackfish Lake Road on the south bank of the Peace River, to collect additional data that will be used to assist in mitigation planning. This field study will build on the baseline data collected in 2006, 2008 and 2013. Surveys will focus on the western toad, which is a species of special concern that is known to breed in the area. Spring surveys (to be conducted in late March, April or May) will focus on documenting the location and type of suitable amphibian breeding habitat while summer surveys (to be conducted in July or August) will document toad dispersal locations along the road alignment. During the summer months the juveniles can conduct mass migration away from breeding habitats. The study area includes the length of the existing access roads and an area up to 100 metres on either side of the roads. A combination of pond breeding surveys, juvenile migration surveys and wetland habitat assessments will be conducted. The surveys will be conducted by two professional biologists. Data collected will be used to provide site	March – August 2014

May 2014

Study Name	Description	Timing
	specific recommendations for mitigation measures that can be incorporated in road design.	
Wildlife Studies – Avian Surveys	Throughout the spring and summer of 2014, BC Hydro will be conducting avian field studies within and adjacent to the Peace River valley between Hudson's Hope and the Alberta border. These studies are being conducted to collect additional data to inform the development of wildlife mitigation and monitoring plans. The surveys will collect data on the presence and activity status of Bald Eagle nests along the Peace River and its major tributaries, and the use of the Peace River by early migrating waterfowl. Helicopter-based surveys will be used to locate Bald Eagle nests. Previously documented nest sites will be re-visited to confirm the nest is still present and determine if it is active or inactive. New nests will be logged and their activity status determined. Nests will be considered active if they are occupied by a bird or egg. At the end of the breeding season, active nests will be re-surveyed to determine the number of young that the nest produced. Bald Eagle nest surveys will be completed in the early spring (late March, early April), in May to determine nesting activity, and in August to record fledgling success. Waterfowl surveys will involve using a low-flying helicopter over the river. The number, species and sex of early migrating waterfowl will be recorded. These surveys will take place once a month in late March, mid-April and May and will take place over the course of six hours per day.	March – September 2014
Wildlife Studies – Jackfish Lake Moose and Elk Monitoring Program	BC Hydro is conducting a moose and elk monitoring study on the south bank of the Peace River, around the Jackfish Lake Road area, between the Peace River and Chetwynd, and in the area of the transmission corridor right-of-way.	December 2012 – April 2015

May 2014

Study Name	Description	Timing
	The first phase of the study took place between winter 2012 and spring 2013, and involved the capture and outfitting of 32 moose and elk with GPS collars. An additional 12 animals were captured in the winter of 2014. Phase II involves tracking collared animals for up to two years, and phase III, the final phase, will involve removing the collars from the study animals following the monitoring period. Ground based track surveys will also be conducted to document road crossings.	*Phase II, tracking collared animals, occurs between May 2013 and April 2015.*
Physical Environment Studies – Peace River Turbidity and Suspended Sediment Monitoring	BC Hydro is continuing the collection of baseline turbidity and suspended sediment data in the Peace River to inform the evaluation of potential effects of project construction on water quality as it relates to fish habitat and municipal/ industrial water supplies. In 2014, BC Hydro will continue maintenance and operation of six turbidity monitoring stations located on either river bank both upstream and downstream of the Site C dam site, as well as just upstream of the town of Taylor and at the Spectra water intake. A service trip will be conducted prior to the spring freshet to clean the sensors, replace batteries, perform a calibration check, and collect sediment samples. Additional service and sampling trips will be conducted as required throughout the year. Field crew access will be by boat and foot.	April – December 2014
Physical Environment Studies - Climate & Air Quality Monitoring	BC Hydro is collecting climate and air quality data from monitoring stations on private and BC Hydro owned land between Hudson's Hope and Old Fort, south of Fort St. John. Information on various climate parameters is being gathered, including: air temperature, humidity, wind speed and direction, fog frequency and density, snow depth and precipitation. Monitoring of particulate matter (mixture of solid particles and liquid droplets in the air) will be conducted at Old Fort, Halfway River and 85th Avenue. These data were used to establish baseline conditions that informed the effects assessment of the Site C project on in-valley climate and air quality	Ongoing monitoring from February 2009.

May 2014

Study Name	Description	Timing
	in the area. BC Hydro is continuing to collect the data to verify actual changes should the project be built and to forecast periods of high tributary inflows for construction planning. BC Hydro also monitors climate within the Peace River watershed in order to forecast periods of high tributary inflows for construction planning. Stations are visited regularly to retrieve data and for maintenance. Access to the monitoring stations is by vehicle, foot and helicopter.	

Note: Access to public and private land may be required in order to complete study work. BC Hydro will obtain permission from land owners and provide notification to BC Hydro leaseholders before entry onto private or leased lands. BC Hydro will adhere to seasonal road restrictions.