

**Terms and Conditions for changes in and about a stream specified by
MWLAP Habitat Officers, Skeena Region**

Please review the publication titled: **Water Management - A Users Guide to Working In and Around Water (referred to as the "Users Guide")**. The *Users Guide* can be found on the internet at: <http://wlapwww.gov.bc.ca/ske/wateract/index.html>. This information will guide the proponent through the Ministry's in-stream work regulatory requirements including which types of in-stream activities qualify under the *Notification* process. The *Users Guide* must be referred to for definitions, detail related to authority, protection of water quality and other water users as well as engineering requirements.

Under Section 42 (1) of the *Water Regulation* (found in the *Users Guide*) authority is given to a Habitat Officer to add specific terms and conditions for instream works to ensure there is protection of habitat in addition to the conditions of general application. Under this authority, MWLAP Habitat Officers, Skeena Region, require mandatory terms and conditions which are contained in this *Terms and Conditions* document. These terms and conditions only apply to works that qualify under the Notification process of the *Water Act*

NOTE: This *Terms and Conditions* document does not supersede the requirements of the *Water Act* and *Regulations*, Federal *Fisheries Act* or any other related legislation. The proponent is obligated to comply with all applicable federal, provincial or municipal enactments.

42 (1) To protect habitat, a person making a change in and about a stream under this regulation, other than under section 44(1)(o) to (s) or (2), must make that change in accordance with terms and conditions specified by the habitat officer with respect to

(a) The timing window or the period or periods of time in the year during which the change can proceed without causing harm to fish, wildlife or habitat,

The timing window of least risk to fish and fish habitat must be applied to all activities in fish streams as well as tributaries that have a risk of depositing sediment into fish streams. Windows of least risk are designed to protect all fish species known to occur in a stream. One way fish presence can be confirmed is through a fish inventory database¹. Please note if using this database that the lack of fish records for a particular area is not necessarily equivalent to fish absence. All streams are assumed to have both spring and fall spawners, until proven otherwise.

There are nine tables prescribing Reduced Risk Work Windows for Fish and Wildlife of Skeena Region. The first concerns Red and Blue Listed species only and applies throughout the Region. The following eight tables are organized by Forest District and include: the Queen Charlotte, North Coast, Kalum (Kalum and Nass Timber Supply Areas), Skeena – Stikine (Kispiox/Cranberry Timber Supply Area), Skeena – Stikine Cassiar (Cassiar Timber Supply

¹ Fisheries Inventory site <http://www.bcfisheries.gov.bc.ca/fishinv/>

Area), Nadina (Morice Timber Supply Area), and the Nadina (Lakes Timber Supply Area), forest Districts respectively.

These periods of reduced risk have been prepared using the best information currently available and replace all other Provincial direction regarding timing windows in this Region.

Species List:

| | | | | | |
|----|----------------|----|--------------------|-----|-------------------------|
| CH | chinook salmon | CT | cutthroat trout | LW | lake whitefish |
| CO | coho salmon | DV | dolly Varden | GSB | giant black stickleback |
| PK | pink salmon | WG | whitefish | GSG | green sturgeon |
| CM | chum salmon | BT | bull trout | BW | broad whitefish |
| SO | sockeye salmon | LT | lake trout | LS | least Cisco |
| KO | kokanee | BB | burbot | IN | inconnu |
| ST | steelhead | GR | arctic grayling | GPW | giant pygmy whitefish |
| RB | rainbow trout | MW | mountain whitefish | | |

Reduced Risk Work Windows for Fish and Wildlife for the Skeena Region General

| Location | Species | Reduced Risk Work Window | |
|---|---|------------------------------------|--------------------|
| | | Start date | Finish date |
| Lower Taku, Lower Iskut, Lower Stikine, Lower Skeena (all marine environments) | Green Sturgeon Red Listed | No Reduced Risk Work Window | |
| Throughout | Eulachon Blue Listed | June 15 | February 15 |
| Throughout | Coastal Tailed Frog Blue Listed | No Reduced Risk Work window | |

Reduced Risk Work Windows for Fish and Wildlife for the Queen Charlotte Forest District.

| Location | Species | Reduced Risk Work Window | |
|-------------------|-----------|--------------------------|--------------------|
| | | Start date | Finish date |
| Throughout | CH | June 15 | July 31 |
| Throughout | CO | June 15 | August 15 |
| Throughout | PK | May 15 | August 15 |
| Throughout | CM | May 15 | August 31 |
| Throughout | SO | June 15 | July 15 |
| Throughout | KO | June 15 | July 15 |
| Throughout | ST | August 15 | November 15 |
| Throughout | RB | August 15 | January 31 |
| Throughout | CT | August 15 | December 31 |
| Throughout | DV | May 15 | August 31 |

| | | |
|---------------------------------|--|--|
| Drizzle Lake, Mayor Lake | Giant Black Stickleback Red Listed | No Reduced Risk Work Window, Confined to lakes only |
|---------------------------------|--|--|

Reduced Risk Work Windows for Fish and Wildlife for the North Coast Forest District.

| Location | Species | Reduced Risk Work Window | |
|-------------------|-----------|--------------------------|--------------------|
| | | Start date | Finish date |
| Throughout | CH | June 1 | July 15 |
| Throughout | CO | June 15 | August 31 |
| Throughout | PK | May 15 | August 1 |
| Throughout | CM | May 15 | July 15 |
| Throughout | SO | June 15 | July 31 |
| Throughout | KO | June 15 | July 31 |
| Throughout | ST | August 1 | December 31 |
| Throughout | RB | August 15 | January 31 |
| Throughout | CT | August 15 | December 31 |
| Throughout | DV | June 15 | August 31 |

Reduced Risk Work Windows for Fish and Wildlife for the Kalum Forest District (Kalum and Nass Timber Supply Areas).

| Location | Species | Reduced Risk Work Window | |
|-------------------|-----------|--------------------------|---------------------|
| | | Start date | Finish date |
| Throughout | CH | June 1 | July 15 |
| Throughout | CO | June 15 | September 1 |
| Throughout | PK | May 15 | August 1 |
| Throughout | CM | May 15 | July 10 |
| Throughout | SO | June 1 | July 20 |
| Throughout | KO | June 15 | August 15 |
| Throughout | ST | August 15 | January 31 |
| Throughout | RB | August 1 | January 31 |
| Throughout | CT | August 1 | January 31 |
| Throughout | DV | June 1 | August 31 |
| Throughout | WG | June 1 | September 15 |
| Throughout | BT | June 1 | August 31 |

Reduced Risk Work Windows for Fish and Wildlife for the Skeena – Stikine Forest District
(Kispiox/Cranberry Timber Supply Area).

| Location | Species | Reduced Risk Work Window | |
|------------|---------|--------------------------|--------------|
| | | Start date | Finish date |
| Throughout | CH | June 1 | July 15 |
| Throughout | CO | July 1 | August 31 |
| Throughout | PK | May 15 | August 1 |
| Throughout | CM | May 15 | August 1 |
| Throughout | SO | June 15 | July 31 |
| Throughout | KO | June 15 | July 31 |
| Throughout | ST | September 1 | December 31 |
| Throughout | RB | September 1 | January 31 |
| Throughout | CT | September 1 | December 31 |
| Throughout | DV | June 15 | August 31 |
| Throughout | WG | June 1 | September 15 |
| Throughout | BT | June 15 | August 31 |

Reduced Risk Work Windows for Fish and Wildlife for the Skeena – Stikine Cassiar Forest
District (Cassiar Timber Supply Area).

| Location | Species | Reduced Risk Work Window | |
|---------------------------------------|-------------------------------|--------------------------|--------------|
| | | Start date | Finish date |
| Throughout | CH | May 1 | July 31 |
| Throughout | CO | April 1 | August 15 |
| Throughout | PK | March 15 | July 31 |
| Throughout | CM | April 1 | September 15 |
| Throughout | SO | April 1 | May 31 |
| Throughout | ST | August 15 | November 15 |
| Throughout | RB | September 1 | April 30 |
| Throughout | CT | September 1 | April 30 |
| Throughout | DV | June 15 | August 31 |
| Throughout | WG | June 1 | August 31 |
| Throughout | GR | July 15 | March 31 |
| Throughout | BT | June 15 | August 31 |
| Teslin Lake | Broad Whitefish Red Listed | April 30 | September 15 |
| Atlin Lake, Teslin Lake, Swan Lake | Least Cisco Blue Listed | April 30 | September 15 |

Reduced Risk Work Windows for Fish and Wildlife for the Skeena - Stikine Forest District (Bulkley Timber Supply Area).

| Location | Species | Reduced Risk Work Window | |
|------------------------|------------|--------------------------|-------------|
| | | Start date | Finish date |
| Throughout | CH | June 1 | July 15 |
| Throughout | CO | July 1 | August 31 |
| Throughout | PK | May 15 | August 1 |
| Throughout | SO | June 15 | July 15 |
| Throughout | ST | September 15 | April 30 |
| Throughout | RB | September 1 | May 15 |
| Throughout | CT | September 1 | May 15 |
| Throughout | DV | June 1 | August 31 |
| Throughout | WG | June 1 | October 15 |
| Throughout | BT | June 1 | August 31 |
| Babine River | ST, RB, CT | September 15 | April 30 |
| Babine River | DV, BT | June 1 | August 31 |
| Copper (Zymoetz) River | ST, RB, CT | September 1 | May 15 |
| Copper (Zymoetz) River | DV, BT | June 1 | August 31 |

Reduced Risk Work Windows for Fish and Wildlife for the Nadina Forest District (Morice Timber Supply Area).

| Location | Species | Reduced Risk Work Window | |
|------------|---------|--------------------------|--------------|
| | | Start date | Finish date |
| Throughout | CH | June 1 | July 15 |
| Throughout | CO | July 1 | August 31 |
| Throughout | PK | May 15 | August 1 |
| Throughout | CM | May 15 | August 1 |
| Throughout | SO | June 15 | July 15 |
| Throughout | KO | June 15 | July 15 |
| Throughout | ST | September 1 | April 30 |
| Throughout | RB | September 1 | May 15 |
| Throughout | CT | September 1 | May 15 |
| Throughout | DV | June 15 | August 31 |
| Throughout | WG | June 1 | September 15 |
| Throughout | BT | June 15 | August 31 |

Reduced Risk Work Windows for Fish and Wildlife for the Nadina Forest District (Lakes Timber supply Area).

| Location | Species | Reduced Risk Work Window | |
|---------------|---------|--------------------------|-------------|
| | | Start date | Finish date |
| Throughout | CH | June 1 | July 15 |
| Throughout CO | | July 1 Au | gust 31 |
| Throughout | SO | June 15 | July 15 |
| Throughout K | O | May 15 | August 31 |
| Throughout S | T | August 1 | April 30 |
| Throughout | RB | August 1 | March 31 |
| Throughout C | T | August 1 | April 30 |
| Throughout DV | | April 15 | August 15 |
| Throughout W | G | April 15 | October 15 |
| Throughout BT | | April 15 | August 15 |
| Throughout B | B | July 1 Ja | nuary 15 |

- Minimize the amount of time the work site is in a disturbed state by completing work as quickly as possible, while considering worker safety and minimizing environmental risk

Notwithstanding the above, if any one of the following conditions is met, the timing window is not applicable:

- If the stream channel is naturally dry (no flow) or frozen to the bottom at the worksite and the instream activity will not adversely impact fish habitat (e.g. result in the introduction of sediment into fish habitat).
- If construction of a winter crossing is proposed and such works does not adversely impact the stream channel (including stream banks), fish habitat or fish passage.

The instream work window for beaver dam removal will correspond to the reduced risk work windows.² Opening plugged culverts or removing beaver dams and draining ponds between October 1st and March 31st can result in mortalities of both beavers and fish and will not normally be accepted. Special circumstances may warrant dam removal during this time. Requests to modify or remove beaver dams, or unplug culverts outside the work window must be accompanied by a detailed request directed to a WLAP Habitat Officer. Such requests will be dealt with on a case-by-case basis, and approval may be given.

² A beaver dam may be modified or removed only in order to protect property (e.g. a road base), as per Section 9(2) of the BC Wildlife Act. A "Habitat Officer" of the Ministry Water, Land and Air Protection (WLAP) establishes terms and conditions associated with the removal or modification of beaver dams, pursuant to Part 7, Sections 42 and 44(1)(v) of the BC Water Act Regulation and Section 9 of the BC Wildlife Act

(b) *The minimum instream flow or the minimum flow of water that must remain in the stream while the change is being made,*

- The natural rate of water flow must be maintained upstream and down stream of the worksite during all phases of instream activity.

(c) *The removal of material from the stream or stream channel in connection with the change,*

- In fish streams, the permanent removal of stable, naturally occurring material from the stream or stream channel is not permitted.
- In non-fish streams, the permanent or temporary removal of stable, naturally occurring material must be minimized and completed only as necessary to make the change in accordance with Part 7 of the *Water Regulation*.
- The removal of material must not lead to stream channel instability or increase the risk of sedimentation into the watercourse.
- Any spoil materials must be placed in a location which ensures that sediment or debris does not enter the watercourse.
- The placement or removal of culverts must be in accordance with Part 7 of the *Water Regulation* and/or the *Fish Stream Crossing Guidebook, March 2002* which can be found at:

<http://www.for.gov.bc.ca/tasb/legsregs/fpc/FPCGUIDE/FishStreamCrossing/FSCGdBk.pdf>

(d) *The addition of substance, sediment, debris or material to the stream or stream channel in connection with the change,*

- Instream activities must be conducted in the dry and the worksite must be isolated from water flowing in the stream channel.
- All equipment must be located and operated in the dry.
- Equipment used in close proximity to the wetted perimeter must be free of deleterious material (e.g. hydrocarbons) and in good mechanical condition (eg no fuel or hydraulic leaks).
- Measures must be taken to ensure that no harmful material (e.g. fuel and other hydrocarbons, soil, road fill, sediment or cast in place concrete and grout), which could adversely impact water quality, fish and other aquatic life, and/or fish habitat, can enter the wetted perimeter as a result of the project activities.
- Any placed materials such as rip rap must be free of silt, overburden or other substances deleterious to aquatic and placed in such a manner so that the flow of water is not constricted.
- Erosion and sediment control structures are to be available onsite and utilized as necessary.
- Do not work in weather conditions likely to contribute to sediment production to the stream
- If approved, beaver dam removal must occur slowly, a series of 20cm drops in dam height, in order to minimize scouring and the addition of silt to downstream areas. Water flowing through a dam breach should normally not exceed 0.2 square metres in area (i.e., a typical breach could measure 1.0 metre x 20 centimetres in size). All

material removed from a beaver dam must be side-cast in such a manner that it cannot re-enter the stream.

(e) The salvage or protection of fish or wildlife while the change is being made or after the change has been made,

- If dewatering of the worksite is necessary, fish salvage must occur on a fish-bearing stream prior to commencing works. A fish salvage permit must be obtained from MWLAP <http://wlapwww.gov.bc.ca/pasb/applications.htm> prior to commencing salvage activities.
- A qualified professional must undertake the fish salvage procedures.
- If an area is de-watered as a result of beaver dam removal or modification and results in the stranding of fish, then these fish must be salvaged and returned to the stream.
- Measures (eg. intake screens) must be taken to ensure that equipment (e.g. water pumps) does not harm aquatic life.
- Do not disturb wildlife and/or their residences (e.g. beaver lodges³) within the project area.

(f) The protection of natural materials and vegetation that contribute to habitat or stream channel stability,

- Minimize disturbance to natural materials (eg embedded logs) and vegetation (overhanging trees/bushes) that contribute to habitat or stream channel stability.

(g) The restoration of the work site after the change has been made,

- Complete restoration activities (including erosion control), as required, that will lead to natural pre-disturbance conditions. This includes natural vegetation seeding and tree planting.
- Any disturbed areas must be restored to function as they did in their pre-disturbance condition. This includes natural vegetation seeding and tree planting.

(h) The requirement to obtain an approval from the federal Department of Fisheries and Oceans in connection with the change.

- Proponents are responsible for complying with the federal *Fisheries Act*. No harmful alteration, disruption or destruction (HADD) of fish habitat is authorized by this document.
- Fisheries and Oceans Canada (DFO) Habitat technologists may authorize a net loss of fish habitat, or HADD, where a mitigation/compensation package can be negotiated between DFO and the proponent.

³Beaver may only be removed by a registered trapline holder. A permit, issued by the WLAP Fish, Wildlife Science and Allocation Section Head, is required to remove beaver by a non registered trapper or outside the trapping season.

- Proponents are responsible for determining whether the federal Department of Fisheries and Oceans (DFO) must be consulted with and whether an authorization from DFO is required prior to making the change. Please see:
(http://www.pac.dfo-mpo.gc.ca/pages/offices_e.htm)