## Bear Management Action Chart - Prepared by the Get Bear Smart Society, April 2010

		Bear Behaviour/ Level of Conflict				
		Level 1 Wary of humans (leaves on approach)	Level 2 Human tolerant Exhibits defensive posturing e.g. huffing; blowing; slapping; lunging; "bluff" charges Causes minor human injury in defensive or surprise situation	Level 3 Causes property damage (including entering vehicles and attacks on livestock) Enters occupied building once through open window or door	Level 4 First sign of aggressive behaviour Causes more serious human injury in defensive or surprise situation Repeatedly causes extensive property damage Breaks into occupied building once	Level 5 Pattern of aggressive behaviour Predatory or non-defensive attack. Enters occupied buildings chronically
Site/Food Source	Level A Bear is feeding on natural foods in natural area; feeds on outskirts of human-use area; or in green space within human-use area (with immediate escape route)	No action necessary.	Manage: people (using enforcement options); site.	Manage: people (using enforcement options); site. Mark bear and manage (using non-lethal tactics).	Manage: people (using enforcement options); site. Mark bear and manage (using AC program).	Manage: people (using enforcement options); site. Destroy bear.
	Level B Bear is occasionally feeding on NON-natural foods in remote area (camps etc).	Manage: ATTRACTANTS; people (using enforcement options); site.	Manage: ATTRACTANTS; people (using enforcement options); site; bear (using non-lethal tactics).	Manage: ATTRACTANTS; people (using enforcement options); site. Mark bear and manage (using non- lethal tactics).	Manage: ATTRACTANTS; people (using enforcement options); site. Mark bear and manage (using AC program).	Manage: ATTRACTANTS; people (using enforcement options); site. Destroy bear.
	Level C Bear is frequently feeding on NON-natural foods in or adjacent to human-use area WITH an immediate escape route	Manage: ATTRACTANTS; people (using enforcement options); site; bear (using non- lethal tactics).	Manage: ATTRACTANTS; people (using enforcement options); site; bear (using non-lethal tactics).	Manage: ATTRACTANTS; people (using enforcement options); site. Mark bear and manage (using non- lethal tactics).	Manage: ATTRACTANTS; people (using enforcement options); site. Mark bear and manage (using <i>intensive</i> AC program until behaviour is extinguished) with option to destroy.	Manage: ATTRACTANTS; people (using enforcement options); site. Destroy bear.
S	Level D Bear is frequently feeding on NON-natural foods in confined human-use areas with NO immediate escape route	Manage: ATTRACTANTS; people (using enforcement options); site; bear (using non- lethal tactics).	Manage: ATTRACTANTS; people (using enforcement options); site; bear (using non-lethal tactics). Immediate option to remove and relocate bear within home range.	Manage: ATTRACTANTS; people (using enforcement options); site. Mark bear and manage (using non- lethal tactics). Immediate option to remove and relocate bear within home range.	Manage: ATTRACTANTS; people (using enforcement options); site. Immediate option to remove and relocate bear within home range.  Mark bear and manage (using intensive AC program until behaviour is extinguished) with option to destroy.	Manage: ATTRACTANTS; people (using enforcement options); site. Destroy bear.

NOTE: This chart is intended as a guide only and does not reflect the policies of any agency or organization. Individual bears with known conflict histories may be managed differently depending on officer discretion. \*\*PLEASE REFER TO ACCOMPANYING DEFINITIONS WHEN INTERPRETING THIS CHART and use only with a full understanding of the contents of the manual *Responding to Human-Bear Conflicts: A Guide to Non-Lethal Bear Management Techniques*; and importantly, implement a program to control attractants (including non-natural and natural foods).

## **Bear Management Action Chart Definitions**\*

**Aggressive/Offensive Behaviour:** See detailed discussion in Section 5.2.2.

Aversive Conditioning (AC) Program: A structured program applying deterrents consistently and sustainably over an identified period of time to achieve modification of an animal's behaviour by pairing the undesired behaviour with pain or an unpleasant stimuli. An intensive AC program requires that wildlife Managers monitor the bear's behaviour at least during daylight hours (or while people are present) and while the bear is in a human-use area. The highest level of conditioning should be used (i.e. Bearmagedon) until the bear no longer exhibits the undesirable behaviour and displays sufficient wariness in the presence of people.

Chronic Behaviour – Persistent, repetitive, unwanted behaviour regardless of whether the bear has other alternatives (i.e. plentiful natural food sources), but chooses to get into conflict situations time and time again. The season/time of year should also be taken into account e.g. a bear that exhibits persistent unwanted behaviour late in the fall, may be given a period of grace until hibernation as it is not necessarily the case that he will come out of the den and exhibit the same behaviours. Furthermore, a bear that exhibits unwanted behaviour once in a while i.e. seems to get into conflict only once or twice a year; or once one year and then not again for a couple of years would not be considered chronic.

**Conditioned Taste Aversion (CTA):** CTA occurs when an animal eats a bait with a nausea-causing substance concealed in it, so that in subsequent encounters the animal avoids the bait. [See Section 7.2 for details.]

**Defensive attack:** A bear that makes full physical contact by either swatting or biting and has exhibited defensive posturing/behaviour (see def'n below) prior to contact.

**Defensive posturing:** Body language and vocalizations used by bears to establish dominance hierarchies; *designed to avoid a physical confrontation*. Bears may also use this behaviour when interacting with people. The behaviour includes direct eye contact, jaw popping, huffing, swatting, lunging and bluff or false charges and is considered ritualized posturing rather than aggressive or offensive. [For more information, see section 5.2.1]

**Destroy:** Refers to killing a bear involved in a human-bear conflict, normally either by a conservation or police officer, in a humane manner.

**Enforcement Options:** See Section 13.

**Escape Route:** A clear route free of obstacles (like traffic, buildings, people, dogs) that leads to bear habitat or a natural area quickly.

**Foods: Non-natural:** Garbage, human food and other odorous products that have attracted a bear (not including fruit trees/berry bushes, crops etc.). **Natural:** Native or non-native species plants (or their parts i.e. roots, fruit, seeds, nuts) that grow naturally/wild in an area (not landscaped plants); insects; fish and small mammals (wild not domestic).

**Hazing:** An immediate Management response to a conflict situation, by using negative reinforcement, to move an animal out of an area or discourage an unwanted activity. Further application is not implied.

**Human Dominance Techniques (HDT):** Human dominance techniques try to mimic bear communication. The person becomes the 'dominant' or 'alpha' animal in a human-bear interaction so that the bear retreats and learns to avoid people and human-use areas. They include: ATTITUDE, Human Presence, Direct Eye Contact; Body Posture, Voice, Pursuit and Bluff Charges [See Section 8.3 for details].

**Human Tolerant:** Indifferent to the presence of people, pets, vehicles or other machinery.

<sup>\*</sup> also see additional definitions in the manual glossary in Section 1

**Human-Use Area:** An area of human development, either urban or rural, but could also include a campground or an established remote camp; park; golf course.

**Manage Attractants:** Ensure that all non-natural foods are removed from the conflict site or stored in a bear-proof manner (such that the bear can not access them). Natural foods i.e. carcass or berry bush/fruit trees should be strongly considered for removal.

**Manage Bear:** Use non-lethal tactics (AC, HDT, bear aversion, bear shepherding) to move the bear away from the conflict site to suitable cover or a more desirable location away from people or busy urban areas, preferably back to a natural area or bear habitat.

**Manage People:** Ensure that people in the area of conflict are kept a safe distance from the bear; educate people as necessary to ensure the circumstances that lead to the conflict aren't repeated. \*\*Use enforcement options, with zero tolerance, to ensure attractants are removed or bear-proofed.\*\*

**Manage Site:** This may include stopping traffic or heavy equipment while a bear is being shepherded away from the site; or if conflicts are expected to reoccur a this site, this may require closing the area or trail, with signage and/or barriers; re-routing human use or using passive aversion techniques.

**Mark:** Use non-toxic paint substance or hair dye to mark bear's side or back; or use coloured ear tag(s) so that he can be identified if he re-offends. A bear may also be radio-collared so that he can be easily found.

**Minor Human Injury:** A person suffers minor wounds as a result of physical contact by a bear not requiring hospitalization i.e. they can be treated on an out patient basis

**Non-defensive attack:** A bear that attacks exhibiting offensive aggressive behaviour [See Section 5.2.2 for details].

**Natural Area:** An area that is not landscaped, but where plants grow naturally/wild.

Non-lethal tactics: A term used to describe various bear behaviour modification methods including AC, HDT, bear shepherding, and hazing.

**Occupied Building:** A four-sided structure in which people live/work.

**Passive Bear Aversion:** Delivery of a deterrent caused by the action of the animal itself e.g. triggering a motion sensor that in turn activates a siren; or making contact with an electric fence (Hunt 2003). It can be accomplished instantaneously in the absence of people.

**Predatory attack:** A bear that attacks a person with predacious interest or intent [See Section 5.2.2.3 for more detailed information].

**Property Damage:** Refers to damage to building or vehicle, but not to birdfeeders; fruit/nut trees; unprotected bee-keeping operation, crops or orchards.

**Relocation:** Capturing a bear and moving him to an area away from human activity and anthropogenic food sources within his estimated home range. The purpose is to remove the bear from an area/situation where he had no escape route and was unable to leave on his own; as well as to buy time to clean up attractants.

Remote area: Wilderness or backcountry spaces away from residential or urban areas.

Serious Human Injury: A person suffers serious wounds as a result of physical contact by a bear requiring overnight hospitalization.

Wary of Humans: Bear leaves when people approach.