



### Section 1

River Segment: Lowville to Castorland Length: 11.7 Miles Beginning Boat Launch: Beach's Bridge Ending Boat Launch: Route 410, Castorland Mapping Dates: 6/8/18 & 6/15/18 Boonville Water Gage Height: 6/8/18 @ 12:00 - 4.39, 6/15/18 @ 12:00 - 4.25 Watertown Water Gage Height: 6/8/18 @ 12:00 - 3.54, 6/15/18 @ 12:00 - 3.15



### Section 2

River Segment: Castorland to Carthage Length: 10 Miles Beginning Boat Launch: Route 410, Castorland Ending Boat Launch: West Carthage Mapping Dates: 6/29/18 **Boonville Water Gage Height:** 6/29/18 @ 12:00 – 4.12 Watertown Water Gage Height: 6/29/18 @ 12:00 - 3.31





## BLACK RIVER NAVIGATION HAZARDS Lowville to Castorland





Debris



Debris





Gravel/Shoals



Debris





## BLACK RIVER NAVIGATION HAZARDS Lowville to Castorland



Debris











Castorland to Carthage



# **BLACK RIVER NAVIGATION HAZARDS**

Castorland to Carthage





## **BLACK RIVER NAVIGATION HAZARDS**

Castorland to Carthage



## Information

### **Equipment**

- Bluetooth Depth Finder
- Bluetooth GPS
- GIS Cloud Mobile Data Collecting App
- Kayak Rig (For Depth Finder & GPS)

#### **Navigation Hazards**



- Gravel Shoals
- Boulders/Abutments/Piles
- Shallow River Depths
- Always Changing Debris Areas

#### **Movement Vulnerability**

Debris (Woody) – High vulnerability of being moved by the river flow. Gravel Shoals – Moderate vulnerability of shifting patterns in the river. Boulders/Abutments/Piles – Low vulnerability of being moved by the river flow.

The river depths are always changing, so it is hard to predict when certain areas will become a hazard to boats, especially for motorized boats. Also, navigation hazards, like debris, can change from month to month in some cases, depending on river flow at different times throughout the year. It is important to understand that this document is just for reference and that these hazards are always changing, even the shoals.

Mapping was completed with the assistance of Mickey Dietrich, RACOG Municipal Management Consultant, NYS Tug Hill Commission and intern Seth Lapp.

