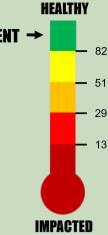
## FIBI502-R1r **Brass Castle Creek Tributary**

**Brass Castle Harmony Road Municipality: Washington County: Warren** Drainage Area (sq miles): 0.9 Sample Date: 6 /23/2016 Site Type: Sentinel





| Metric 1 - Number of intolerant vertebrate species            | 66.67  | Air Temperature (°C)    | 19.5  |
|---|--------|-------------------------|-------|
| Metric 2 - Proportion of vertebrate species as top carnivores | 65.79  | Water Temperature (°C)  | 15.8  |
| Metric 3 -Percent tolerant fish                               | 100.00 | Dissolved Oxygen (mg/L) | 9.29  |
| Metric 4 -Proportion of total richness as native              | 100.00 | % Saturation            | 96.4  |
| Metric 5 -Percent native crayfish                             | 100.00 | рН                      | 6.84  |
| Metric 6 -Brook trout density                                 | 100.00 | Conductivity (uS/cm)    | 172.5 |

| Headwaters IBI Score (0-100):        | 88.74     |
|--------------------------------------|-----------|
| IBI Rating:                          | Excellent |
| High Gradient Habitat Score (0-200): | 170       |
| Habitat Rating:                      | Optimal   |

**Summary:** FIBI502 is a sentinel site which is sampled every three years for Headwaters IBI monitoring to evaluate assemblage changes through time and to better understand natural variability. This site contains an abundance of brook trout, as well as several other sensitive crayfish and salamanders. This site decreased in score slightly from its previous sampling in 2013 but remains in excellent condition.

## **FIBI502-R1r** Brass Castle Creek Tributary

| Common Name                   | Scientific Name            | Abundance |
|-------------------------------|----------------------------|-----------|
| Brook Trout                   | Salvelinus fontinalis      | 170       |
| Blacknose Dace                | Rhinichthys atratulus      | 133       |
| Northern Two-lined Salamander | Eurycea bislineata         | 62        |
| Common Crayfish               | Cambarus bartonii bartonii | 7         |
| Northern Dusky Salamander     | Desmognathus fuscus        | 1         |