2019 PROGRESS REPORT

Quarter: (circle one)
 $2019 1^{st}$ $2019 2^{nd}$ $2019 3^{rd}$ $2019 4^{th}$

<u>Grant Program, Number and Title</u>: RCN, GSA 00047; Eastern Box Turtle Status Assessment, Conservation Plan, and Best Management Practices.

Organization: H. Patrick Roberts (Independent Contractor)

Project Leader: H. Patrick Roberts

<u>Abstract</u>: Please provide a short (1-2 paragraphs) abstract that addresses EACH of the following: the objectives of your project, accomplishments to date, future plans and timelines with an estimate for when the project will be completed.

The objective of this project is to develop a status assessment and conservation plan for the Eastern Box Turtle (Terrapene carolina carolina) in the northeastern United States. This contract with the Wildlife Management Institute was executed at the very end of the first quarter of 2019. As a result of this delayed start, the timeline for the initial objectives of this project was shifted forward accordingly. During the second quarter of 2019, Patrick Roberts and Lori Erb (of MACHAC) held monthly Steering Committee calls in April, May, and June to discuss the overarching goals and objectives of the project and discuss the development of an Eastern Box Turtle standardized monitoring protocol. After consulting with the Steering Committee as well as existing protocols and literature, Patrick Roberts and Lori Erb, with the help of Lisabeth Willey (American Turtle Observatory), worked to develop the standardized monitoring protocol for a 2019 pilot sampling effort. This protocol includes three separate sampling frameworks for visual encounter surveys that will be quantitatively assessed and compared once adequate data is collected using each methodology. Upon request from a Steering Committee member, an additional dog-based protocol was outlined, but not completed due to time and logistical constraints. In addition to the monitoring protocol, a "2019 Survey Guidelines" document was developed to provide guidance for how states should consider directing survey effort in this initial pilot year of sampling. Several field forms as well as a data entry template were also developed. All documents are publicly available at northeastturtles.org, a website created to house materials related to select turtle conservation plans in the northeastern United States. The sampling protocol has been tested in at least three states so far (Massachusetts, Pennsylvania, and Delaware). A complete summary of survey effort will be compiled once data has been submitted using the data-entry template. A plan was established with MACHAC for splitting the duties associated with requesting occurrence data from state agencies. To date, occurrence data has been received from the Massachusetts Division of Fisheries and Wildlife Natural Heritage and Endangered Species Program. A broad search was conducted for high-quality regional data layers that can be used in future modeling exercises.

Immediate next steps will be to (1) continue to collect available occurrence data from throughout the Northeast, (2) search for relevant data layers until analyses are completed, (3) compile survey data and occurrence data into respective databases, and (4) continue to hold monthly conference calls. We expect to complete this project by February 2023.

Were planned goals/objectives achieved last quarter? Yes.

Progress Achieved: (For each Goal/Objective, list Planned and Actual Accomplishments)

Planned and accomplished:

- Collaborated with MACHAC and ATO to draft a regional population monitoring protocol and create accompanying field forms and data-entry templates
- Coordinated with state agencies to implement the protocol in a subset of states in the Northeast
- Began requesting occurrence data from state agencies
- Gathered regional data layers for use in future modeling for this project

Difficulties Encountered: N/A

Activities Anticipated Next Quarter:

- Continue to hold monthly conference calls
- Work with remaining state agencies to develop data-sharing agreements for occurrence data
- Begin to develop the regional occurrence database
- Continue to gather regional data layers

Expected End Date: February 28, 2023.

Costs:

Total life to date expenses (include this quarter): \$9,879.35 (including match)

Total Approved Budgeted Funds: \$68,500

Are you within the approved budget plan and categories? Yes.

Signature:

Date: 07/12/2019