

DTC – DeckTechCentral

Team Members:

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Introduction:

This project aims to implement a website to allow users to build Magic: The Gathering deck lists in a very innovative and simplistic manner. The user will begin by creating an account that grants them access to build the deck list of their dreams. They will have access to a large library of cards to choose from when creating their deck list.

Motivation:

Improve the Magic: The Gathering deck-building experience through innovative features like card ranking, along with an accessible and user-friendly website. We feel as though the current deck-building websites offer a lackluster set of features. We want to drastically improve the user experience while putting our own twist on some outdated features.

Objectives:

- **Back-end:** A sturdy back-end will allow for efficiency and strength within the entire project. We must handle all calls and messages between the front-end and back-end properly.
- **Database:** Design and implement a database in coordination with the back-end. The database will store user information, deck information, etc.
- **User Interface (UI):** The website UI will be very clean and complete. It will have all the functionalities of deck list creation and will allow for smooth and simple navigation.

Implementation Techniques:

- **NoSQL Database:** The database will be a NoSQL document-based database that will be hosted off-site. The design and setup of the database will heavily assist in full-stack development.
- **React with Chakra UI:** The front-end website will be created using React and Typescript with Chakra UI to help make the front-end look as good and feel as responsive as possible.
- **ASP.Net Core:** This will handle all calls made to the back-end and aspects such as logging in, data fetching, and data creation. We will use tools from this to help us have secure user authentication and handle user authorization.

Potential Users:

Magic: The Gathering players who want to organize and optimize their deck, as well as rate the cards by how they affected them and their usefulness. Other potential users could be people learning how to play the game who want information on the possible cards and their strength(s).

Features & Deliverables:

- **Deck List Creation:** The users can create a deck based on Magic: The Gathering cards.
- **Card Rating:** The user can report games they played using a deck list and report how well the different cards they saw worked. This can be used to better optimize their list to make better decks.
- **Public Deck List Library:** When creating a deck list, users have the ability to make it public. This will allow other users to see the deck list and compare it with their own lists.