#### Problem:

Larger scale events can be well over 1000 players and looking for a seat among 500 tables can be difficult and time-consuming. As an event grows in size, the logistics of getting all the information communicated to players and getting them into their seats in a timely fashion can be a nightmare. Even smaller scale events face serious delays when people do not make it to their seats on time. Time extensions may be given, but those contribute to making a longer day for everyone as the event cannot continue and begin the next round until all matches from the current round have been completed and reported the results.

Finding your seat location at Magic: the Gathering events can be a hassle. The current system uses a system of table numbers 1-n, and the player is given the number of their table and must locate it within the tournament area. Seating is normally arranged in numerical order, 1-n, and normally players use that information to estimate where their table number will be, then visually confirm the table number.

Being late to your seat can cause unwanted delays, making the event move slowly for everyone. At higher Rules Enforcement Levels during competitive play, being late to your seat can result in game and then match losses, ruining your chances at winning and making it into the usually untimed elimination rounds.

## **Background:**

The current system exists as two parts: EventLink, a software that allows a Tournament Organizer (TO) to schedule, maintain, and run a tournament; and the Companion App used by players to enter into the event, get round pairings and table numbers, and see standings. There are other options that are broader and not specific to M:tG like challonge or melee.gg. These can be used for magic events or something like chess or a video game tournament. Research indicates that they presently operate using a similar

system of numbering tables 1-n and letting players find their seat location based on numerical order.

#### Solution:

Display a seating chart image to the player that highlights their assigned seat for the round. Use phone data for the compass direction to ensure the image is facing the correct direction relative to the event space.

The Tournament Organizer will be able to manually create and save a layout for tables for their event spaces that will be used as the default. There will also be an option to create additional seating profiles on the fly for adjusting things like number of tables and locations. Adding additional rooms and accurate outer walls is probably not required, displaying the seating layout should be sufficient.

When the TO starts an event, choose: (skip, use default, new):

- -use a check box to opt-in to this feature for the event being created
- -use default will use the new default saved option
- -new will take the TO to a screen to build and save the table layout for future use. If there is no default, this one is set to the default (right click option to delete saved layouts)

#### Research:

Pima Library Search:

https://www.proquest.com/docview/1728217139?pqorigsite=summon&accountid=13194&sourcetype=Wire%20Feeds

https://www.proquest.com/docview/1898415708?pqorigsite=summon&accountid=13194&sourcetype=Wire%20Feeds Pima Library research options have articles that are relatively old for the subject, (2015, 2017) and they do not have a ton of relevant information on software features. Google search results have yielded more relevant results:

## https://wpn.wizards.com/en/news/definitive-guide-wizards-eventlink

The Wizards of the Coast website includes a great guide for how to use all the existing features of EventLink. Through viewing the available features at this link and reaching out to local Event Organizers, I have determined that the EventLink and Companion App software currently do not have a feature to display visual representation of table location and layout.

## https://geomag.bgs.ac.uk/education/smartphones.html

From the British Geological Survey Website, we can see how cellphones are able to determine what compass direction a person is facing. As long as the user allows the Companion App to access this information from the device, we can use that to display a compass marker for North on the seating layout map displayed to the user.

# https://melee.gg/

melee.gg is another general purpose tournament registration and pairing software and website. It also does not presently possess such a feature.

https://challonge.com/?gad\_source=1&gclid=Cj0KCQiAgdC6BhCgARIsAPW NWH1odhMJi\_an16Kv7Ix2DPCPAxVVTnSkS6LKquHaSOtvjjOEHi0UfK4aAq02E ALw\_wcB

Challonge is another major tournament registration and pairing website that can be used for M:tG or other games. It also does not presently have a seating layout map displayed to the user.

https://www.ebay.com/itm/276719486282?chn=ps&norover=1&mkevt=1&mkrid=711-117182-37290-

0&mkcid=2&mkscid=101&itemid=276719486282&targetid=2299003535955&device=c&mktype=pla&googleloc=9030236&poi=&campaignid=21214315381&mkgroupid=161363866036&rlsatarget=pla-

2299003535955&abcId=9407526&merchantid=115289845&gad\_source=1&gclid=Cj0KCQiAx9q6BhCDARIsACwUxu72ouPOP4sYUchkqfhhl6qpPoKIleQxwh4RDgAZaaADGYpF3h9zL6IaAqryEALw\_wcB

Portal mtG image source

https://www.istockphoto.com/photos/chess-pawn

Pawn image source

https://www.istockphoto.com/photos/you-are-here-sign

You are Here image source