

Event Planner Application: Overview

We made sure that the title requires an input so when trying to submit the form an alert says "Please fill out this field". We also made the "Title" field take an input of strings and is not longer than 255 characters long. The description field can be left blank since it is optional. It will also take an input of single line and multi line strings. The strings are wrapped when longer than 75 octets and have a maximum input of 75 characters. Classification has a default of public but can be changed to private or confidential if needed. We made sure that the organizer and attendee field both take a valid email address and will display an alert saying "Email is invalid!" if not. Organizer email and attendee email can not be the same and attendee email can not contain duplicates or an alert saying "Email is a duplicate" will appear.

We also made sure to include date validation. Both the "Start" and "End" fields must take an input or else an alert will pop-up. They also must be after the current date (if it is currently May 10th, 2020 12:30pm, the user won't be able to select prior dates nor type them in without an alert showing). In making valid dates, the "Start" date always has to be before or the same as the "End" date. By default, our application has the two values equivalent to the current date, making it valid. However, if the user were to select or type in a "Start" date that is later than the "End" date, the "End" date will automatically become equivalent to the "Start" date to avoid an error. Likewise, if the user types in an "End" date prior to the "Start" date (prior dates are grayed out in the calendar dropdown, i.e. cannot be selected), then a "Fix end time!" alert will appear.

For recurrence, the "Repeat" field has five options to choose from - "Once", "Daily", "Weekly", "Monthly", and "Yearly". Each option other than "Once" has two choices. If the checkbox for the repeat end date is left unchecked then the event recurs forever. If the checkbox for the repeat end date is checked then an input field "Until" appears and a date must be chosen for the repeat end date. For validation, if the box is checked and there is no input in the "Until field" then an error displays asking to "Enter a date to repeat until" and the form cannot be submitted. "Once" is the default choice and takes no date input it will create an event with no recurrence. For example any repeat option other than "Once" is selected and the checkbox for repeat end date is checked and an input for the repeat end date is "May 30 2025". Then an event will be created that recurs until "May 30 2025" either "Daily", "Weekly", "Monthly", or "Yearly". For validation, the calendar selection for repeat end date won't allow dates that are less than the start date chosen. However, if the start date has been changed to be less than the repeat date after the repeat end date was chosen, an error displays - "Can't repeat before start date" and the form cannot be submitted. Also if the end date year is greater than the start date year such as "Start: May 30 2020" with an "End: May 30 2025" then an error displays - "End year must be the same as the start year if repeat is not once" and the form cannot be submitted.

As we described in our words and shown in our application, our system is correct. But it is also useful. At the bare minimum, only a title and time is necessary to create an event. We also cannot make events in the past, which is practical for any user. The six time zones selected cover anywhere in the USA and automatically adjust for standard and daylight savings when inputted into a calendar. Recurring events in four variations, whether infinite or ending at a specific date, are present, useful for anyone who has set routines or schedules. And last but not least, our .ics files are verified to work across multiple applications to accommodate a wide audience: *Microsoft Outlook*, *Apple's Calendar*, and *Google Calendar*.