# Project Coyote: Specification Document

## **Mission Statement**

Our mission is to create a running management tool capable of creating and maintaining races and competitors results. The product is targeted at any running club throughout New Zealand.

## Index

- 1. Managing competitions
- 2. Managing events
- 3. Managing competitors
- 4. Online Interface
- 5. Emailing
- 6. Help

# 1. Managing competitions

The system must allow a user of the Project: Coyote management application the ability to manage numerous competitions in an effective manner. Competitions consist of one or more events.

- 1.1 Create a **new competition**: A competition serves primarily to group events. A user of the Project: Coyote management application is able to do any of the following:
  - 1.1.1 **Define the name** of the competition.
  - 1.1.2 **Define the type** of the competition (can be selected from a pre-saved template).
  - 1.1.3 Based upon the type of competition selected, one or more events will be required (eg. a track and field day or a single race). If there are multiple events and the user wants Project: Coyote to schedule them, then the competition must also have a start and finish date and time, with the events given a run time rather than a start and finish time.
- 1.2 **Edit a competition**: A user of the Project: Coyote management application is able to do any of the following:
  - 1.2.1 Change the name, type, and start and finish times and dates of a competition.
  - 1.2.2 Add and remove events from a competition.
- 1.3 **Delete a competition**: The user must be able to delete/remove a competition if it is no longer needed.
- 1.4 **Create a schedule**: Once the competition and the events it contains are defined, the user must be able to have the competition schedule the events that it contains automatically.
- 1.5 **Output results**: Once the results for all of the events that the competition contains have been entered, the user must have the option to output all the results of the competition events. These results may consist of times, placings, points, or any combination of the three based upon the type and number of events. The output can be any of the following types:
  - 1.5.1 A CSV file.
  - 1.5.2 An Excel file.
  - 1.5.3 Upload to a website of the user's choosing (low priority).
  - 1.5.4 Printed as a hard-copy.
- 1.6 **Define and save presets**: The user must to be able to define templates for competitions so that they can be used again later as the basis for another competition.

# 2. Managing events

An event is a contest with at least two competitors which is grouped by distance/discipline and age group. One or more events will be associated with every competition. Events may be ran as straight finals or require heats where competitors qualify for more important events (e.g. a semi final/final). Most event managing will be completed inside the Project: Coyote application.

- 2.1 **Create a new event.** Provide a way for the user to add events to a competition.
- 2.2 **Edit an event.** Provide a way for the user to edit distances and age group information for an event.
- 2.3 **Delete an event.** Provide a way to remove events from a competition
- 2.4 **Add entries.** Provide a way to add competitors to an event
  - 2.4.1 Add competitors to an event by selecting competitors from the database
  - 2.4.2 Add competitors to an event by importing a .csv file which contains entry information
  - 2.4.3 Add entries to an event by dragging and dropping from another event that is currently open
  - 2.4.4 Add entries to an event by importing web entry information using a .csv file
- 2.5 **Record Results.** Provide a way to record the results of an event
  - 2.5.1 Enter in times and placing information manually
  - 2.5.2 Import the results by importing information from the finishlynx photo finish software
- 2.6 Generate **heat allocation**. Provide a way to allocating heat and lane numbers to a sprint event.
  - 2.6.1 Allocate heats by separating placing the faster competitors into different heats
  - 2.6.2 Allocate heats by placing the faster competitors into the same heat
- 2.7 **Generate finals qualifications.** Provide a way of automatically entering competitors from heats into more important events (e.g. a final)
  - 2.7.1 Take the required number of competitors by fastest finishing times
  - 2.7.2 Take the fastest two from each heat then the fastest losers until the required number of competitors has been reached.

- 2.8 Calculate **start times for a handicap race**. Provide a way to automatically calculate start times for a handicap race.
  - 2.8.1 Predict finishing time using previous results recorded in the database from prior competitions
  - 2.8.2 Use a time inputted to calculate start time
- 2.9 Produce **entries list.** Provide a way of outputting a list of entries for an event to aid start line role taking and other uses.

# 3. Managing competitors

The system provides a management interface for a user to create and manage competitors for an event.

## 3.1 **Create a new competitor** or competitors specifying:

- 3.1.1 First name and Last name, must be proper name format
- 3.1.2 Sex, must be either Male or Female
- 3.1.3 Birth date
- 3.1.4 Other optional fields including School year, School, Club, Email, Phone, Coach, Fees, Athletics NZ athletics number

## 3.2 Edit a competitor

- 3.2.1 Change the first name or/and last name of the competitor. Must be a valid name format.
- 3.2.2 Change the sex, either Male or Female
- 3.2.3 Change the birth date
- 3.2.4 Add values to other optional fields
- 3.2.5 Change values of other optional fields

## 3.3 **Delete one or more competitors**

- 3.3.1 Delete one or more competitors from an event.
- 3.3.2 Delete from the competitor database

## 4. Online Interface

The system will provide written information on how to use it

- 4.1 **Competitors must register** a user account to use website features
  - 4.1.1 The user account will be associated with a competitor entry in the database.
    - 4.1.1.1 When creating an account the user will be prompted with a list of competitors in the database with no associated user accounts. They will be asked if any on the list are them. If so, that database entry will be associated with the new user account.
    - 4.1.1.2. **If no competitor exists** in the database matching the user, a new competitor will be added to the database and associated with this account.
  - 4.1.2 The user must fill out all required information when creating the account.
- 4.2 User **account must contain** the following information:
  - 4.2.1 **Surname**. Alphabetical, max 32 characters, not optional.
  - 4.2.2 **First name(s)**, Alphabetical, max 32 characters, not optional.
  - 4.2.3 **Date of Birth**. A date in the past no earlier than year 1900, not optional.
  - 4.2.4 **Gender**. Male or Female, not optional.
  - 4.2.5 **E-mail**. Correctly formatted email address, not optional.
  - 4.2.6 **Password**. Alphanumeric, 6-32 characters, not optional.
- 4.3 **User may login** to their online account
  - 4.3.1 They must use their first name, surname and password stored in the account to verify their identity.
  - 4.3.2 The user may use any internet connected computer with a web browser
- 4.4 The user must be able to **enter events** in a competition **while logged in**
- 4.5 The user must be able to **view information** from the database relevant to their competing history while logged in, including:
  - 4.5.1 Personal statistics
  - 4.5.2 **Results** from previous races that they competed in
  - 4.5.3 **Account Information** as defined in 4.2
- 4.6 It must be possible for the user to edit **their account information** (as defined in 4.2) while logged in.

# 5. Emailing

Users have the tools and utilities to create and customize email templates to assist in the manual and automatic delivery of bulk emails to registered users.

## 5.1 Email templates

- 5.1.1 **Create template** Users can create text based templates and save them to Project Coyote.
- 5.1.2 **Modify** Users can view stored email templates from Project Coyote, modify template and/or save current template.
- 5.1.3 **Delete** Users can select individual or multiple templates to delete from Project Coyote.

## 5.2 **Send emails**

- 5.2.1 **Users** can manually enter or select participants from a registration list into an email text field to send an email.
- 5.2.2 **Users** can manually enter the content of an email as text into an email text area or select a stored email template from Project Coyote.
- 5.2.3 **Users** can set a date to send an email. Important note: the email will be sent at or after the time of date when Project Coyote is running.
- 5.2.4 **Users** can save an email with the corresponding participants, description, content and date into Project Coyote.

#### 5.3 Automatic emails

- 5.3.1 **Stored emails** can be linked to **reoccurring dates** by a user and automatically sent at or after the date specified, and as of the running status of Project Coyote.
- 5.3.2 **Stored emails** can be linked to **previous races or events** and sent in advance to the reoccurrence of the race or event. The earliest an automatic email can be sent is four weeks before the race or event.

## 6. Help

The Help system consists of visual aids consisting of text and image based documentation to assist a user in navigating and interacting with Project Coyote.

## 6.1 View help

- 6.1.1 **Accessible** from Project Coyotes main window or through a hotkey.
- 6.1.2 **Contained** in an external movable window with default open, close, maximize, minimize properties. Initial position of window set to right most position on screen.
- 6.1.3 Help window can be **integrated** back into Project Coyote main window and vice versa.
- 6.1.4 Search help features and visual aids can be **viewed in parallel**.
- 6.2 **Search help** Project Coyote users can access tutorials from a help window through:
  - 6.2.1 **A context** menu displaying and allowing a user to select a tutorial or visual aid.
  - 6.2.2 **An index** categorically listing key elements related to Project Coyote with an incorporated index search function.
  - 6.2.3 **Search menu** allowing a user to search the context menu and categorical index for a key word.
- 6.3 Help window functionality
  - 6.3.1 **Search help features** can be minimized and maximized to increase visual aid space.
  - 6.3.2 **Previously viewed visual aids** can be iteratively viewed backwards and forwards by a user.
- 6.4 **Keyboard shortcuts** are viewable by users in a help window with a corresponding description of the shortcut.
- 6.5 **Users can view** the fore most facts related to Project Coyotes production date, copyright and 1337 authors.

# Glossary

*Competition* Is one or more events at a specific date, time and location

*Event* A single competitive contest with multiple competitors usually grouped into

age categories or ability

*Race* A single competitive contest which involves sprinting/running

*Heat* A preliminary sprinting/running race in which the competitor advances to a

more important race