

# **Final Report**

**Hockey Pool Group 19**

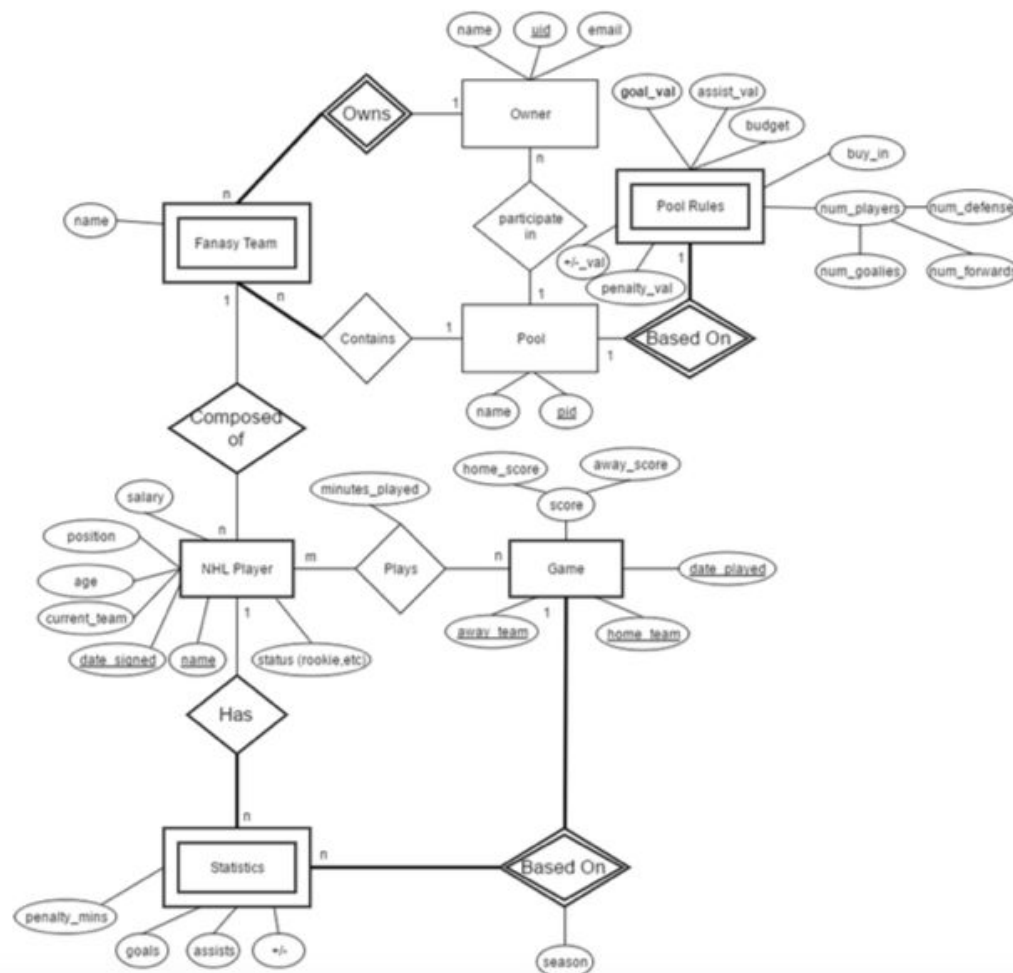
**Tyrone Lagore, Bruce Laird, Johnny Simmonds**

## 1. A summary of the system requirements and any additions you may have made.

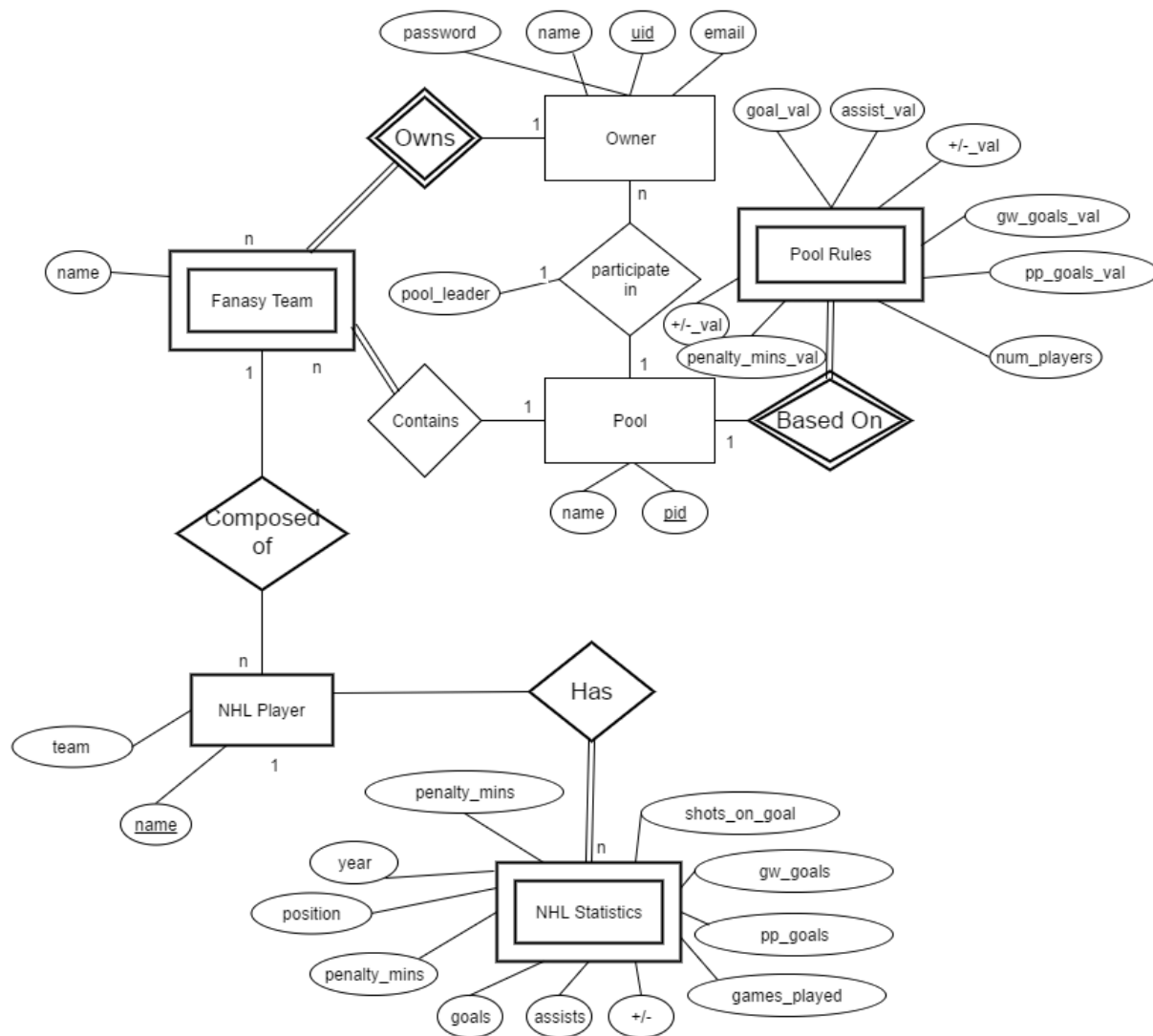
Our group made use of PHP, MySQL and also a template engine called Twig for PHP that allows for dynamic HTML generation that is beyond the regular capabilities of PHP such as extending templates that are frequently used to minimize duplicating code. Additionally Twig allows for the separation of HTML and PHP which decouples server side logic from client interaction allowing for cleaner code.

## 2. The entity-relationship design.

EER Diagram

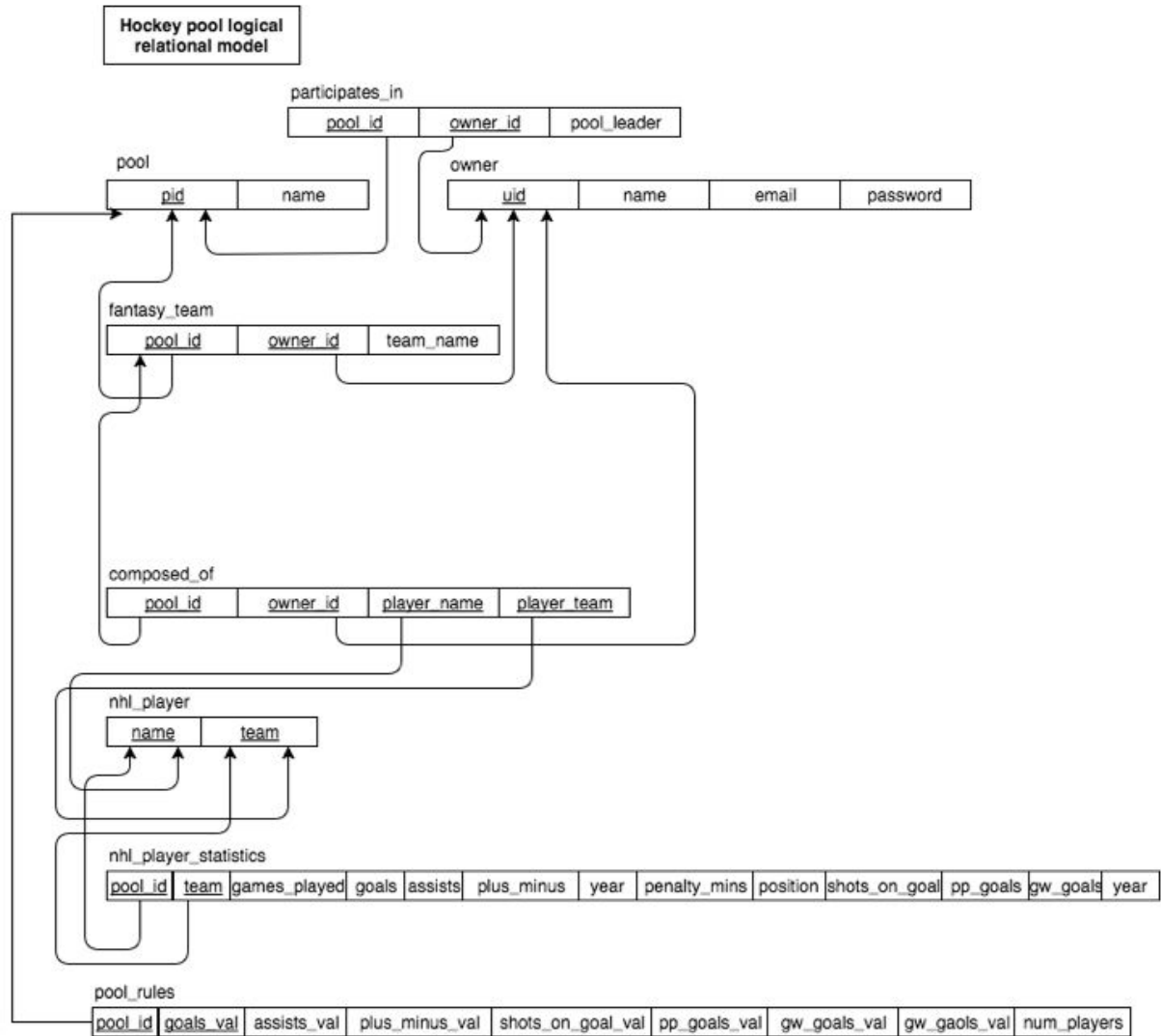


## Updated EER Diagram:

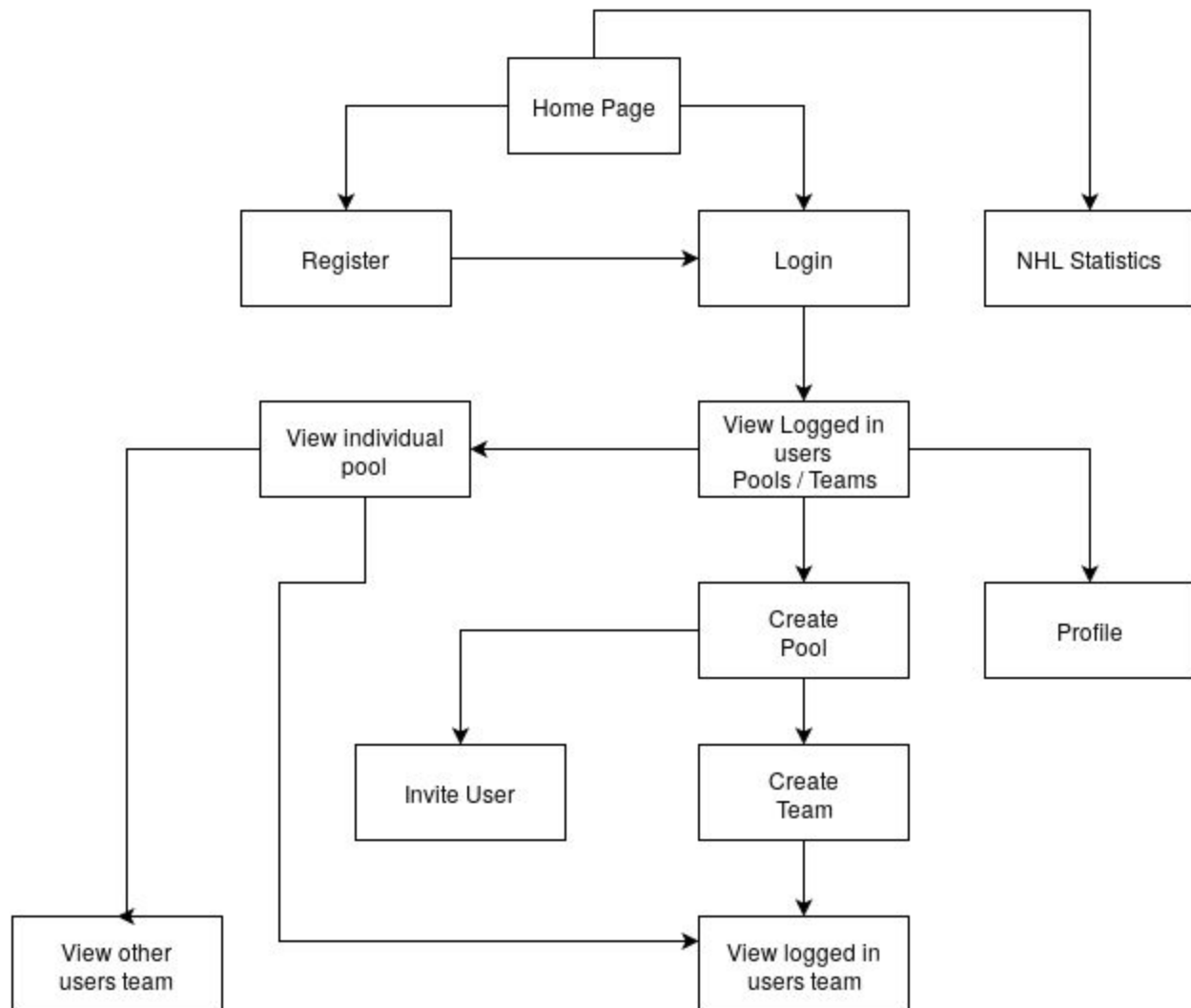


We removed the Game entity as we discovered that most statistics are actually encapsulated within just the NHL statistics themselves and it streamlined our model to have less overhead. We added additional attributes to NHL statistics, as well as moved a few attributes from NHL player to NHL statistic as it seemed more appropriate to keep them there. One such attribute is position, as players can play different positions from game to game. We added attributes to pool\_rules to reflect the additional attributes in NHL statistics, and also removed the limitation of having a certain number of specific positions. We added an attribute to the relationship participates in to indicate who the leader of the specified pool is.

### 3. The Updated Relational Model Design.



#### 4. The Updated General Hierarchical Structure for the Application Programs.



The NHL Statistics page can be accessed from any of the other pages through the navigation bar at the top of each page.

The My Pools page can be accessed from any of the other pages through the navigation bar at the top of each page as long as the user is logged in. If the user is not logged in it redirects them to the login page.

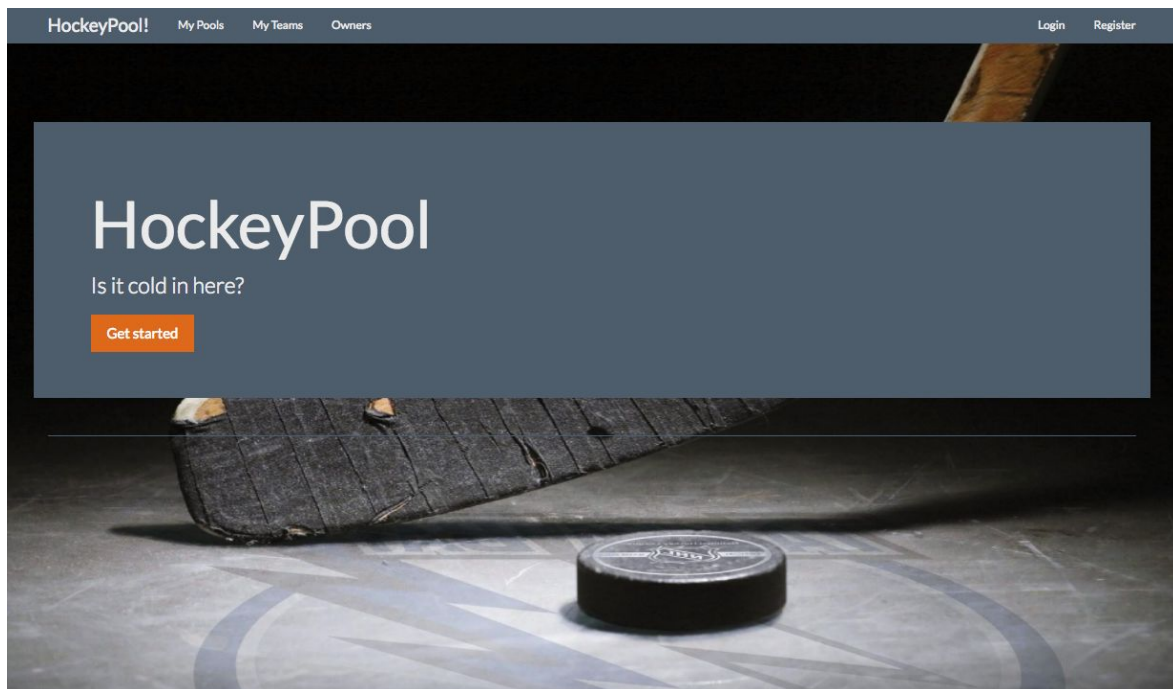
## 5. Hockey Pool User Manual

Hockey Pool Site is breathtaking: a beautifully made product provided free to anyone. This has obviously been a labour of love and creativity. The high-quality and extensive content is made easily accessible through quick search and easy to understand navigation through the website. Recommended for any NHL hockey fan.

This site allows you to create an account and join or create your own fantasy pool. Once you have created or joined a pool you can then make your own fantasy team by searching for your favourite players from the search field. If you are making a fantasy pool you can also customize it by adjusting the pool rules.

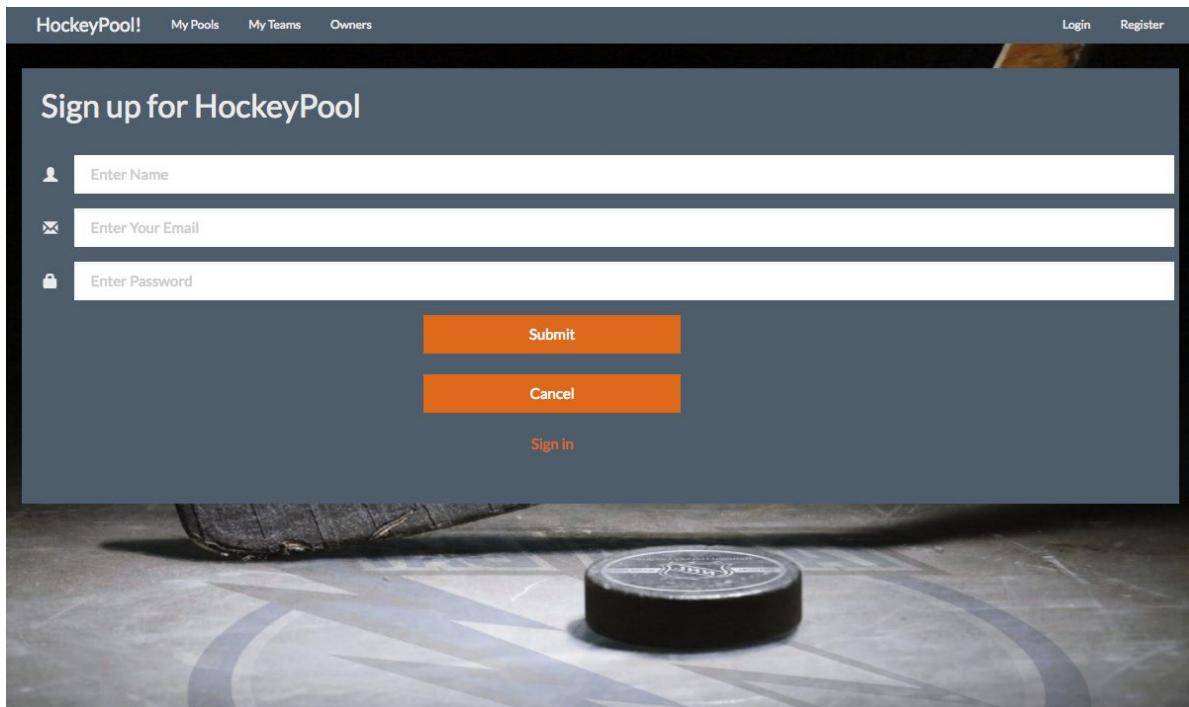
### Main Page

This is the initial page before logging in or signing up, click 'Register' to proceed to registration or click 'Login' if you are a pre-existing user.



## Register

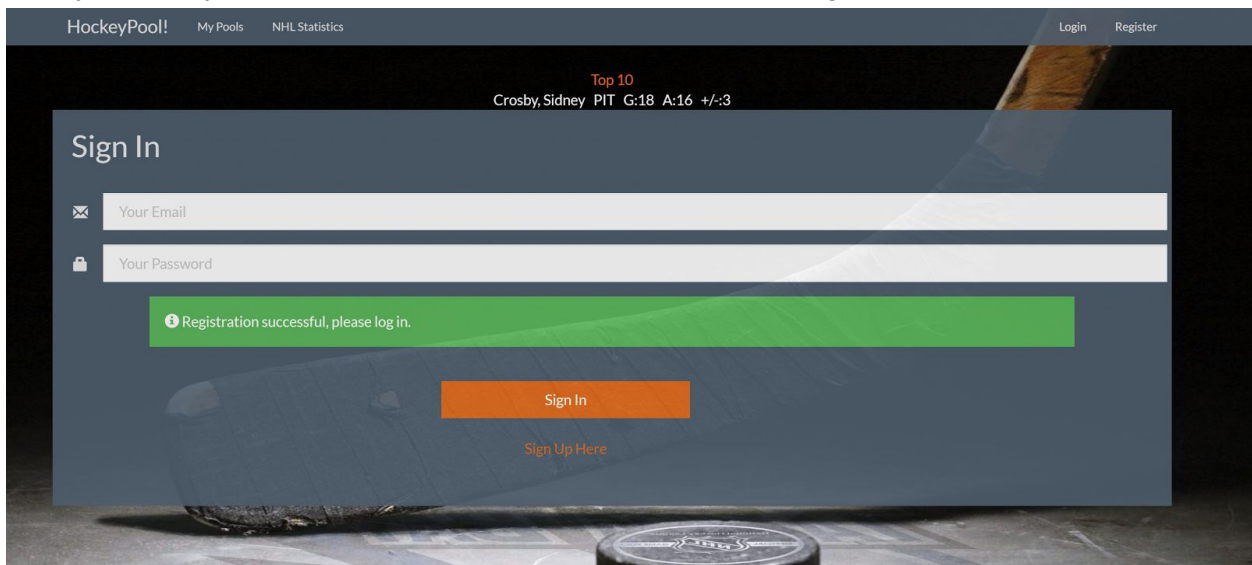
On this page all that is needed to register is for you to enter in your email address and to choose a password, once you have done this click 'Submit'.



The screenshot shows the 'Sign up for HockeyPool!' form. At the top, a navigation bar includes 'HockeyPool!', 'My Pools', 'My Teams', 'Owners', 'Login', and 'Register'. The form itself has a dark blue header with the title 'Sign up for HockeyPool!'. Below this are three input fields: 'Enter Name' (with a person icon), 'Enter Your Email' (with an envelope icon), and 'Enter Password' (with a lock icon). There are three orange buttons: 'Submit', 'Cancel', and 'Sign in' (which is a link). The background of the page features a hockey puck on an ice rink.

## Login

Simply enter in your email address and password and select 'Sign in'.



The screenshot shows the 'Sign In' page. The navigation bar at the top includes 'HockeyPool!', 'My Pools', 'NHL Statistics', 'Login', and 'Register'. Below the navigation bar, there is a small section showing 'Top 10' with the text 'Crosby, Sidney PIT G:18 A:16 +/-:3'. The main form has a dark blue header with the title 'Sign In'. It contains two input fields: 'Your Email' (with an envelope icon) and 'Your Password' (with a lock icon). Below these fields is a green message box that says 'Registration successful, please log in.' with an information icon. There are two orange buttons: 'Sign In' and 'Sign Up Here' (which is a link). The background of the page features a hockey puck on an ice rink.

## Profile

In order to change your password select you email in the top right corner of the page once you have signed in.

HockeyPool! My Pools NHL Statistics a@b.c Logout

Top 10  
Malkin, Evgeni PIT G:9 A:+/-:0

## Profile

Email a@b.c

Old Password Current Password

New Password New Password

Cancel Submit

## Create Pool

To create pool the user can click on 'My Pools' and then once the page has loaded click on 'Create Pool'. This will send them to the 'Pool Rules' page where they will enter in their pool name and can adjust the remaining categories according to what they want to matter in their pool. For example if a user wanted only goals to matter they could change goals to one and set everything else to be zero. After this the user will click 'Create Pool'.

HockeyPool! My Pools NHL Statistics a@b.c Logout

Top 10  
Kucherov, Nikita TB G:12 A:16 +/-:11

## Pool Rules

Pool Name Enter Pool Name

Goals Fantasy Value

Assists Fantasy Value

+/- Fantasy Value

Penalty Minutes Fantasy Value

Shots on Goal Fantasy Value

Power Play Goals Fantasy Value

Game Winning Goals Fantasy Value

Number of Players # Players allowed

Create Pool



## View My Pools

My pools is a list of all the pools that the user is involved in. If the user has been invited to a team, but not created a team yet, the team name will reflect this and the user may click the link to create the team for this pool. You can follow team link to view the team, or the pool link to view all teams in the pool.

HockeyPool! My Pools NHL Statistics a@b.c Logout

Top 10  
Kane, Patrick CHI G:8 A:16 +/-:3

### My Pools

🏆 indicates that you are the leader of the pool.

Show 10 entries Search:

Owner	Team Name	Pool Name
🏆 bertram	<a href="#">Create a team</a>	<a href="#">asdasd</a>
🏆 bertram	<a href="#">Happy Team</a>	<a href="#">Tyrone</a>
🏆 bertram	<a href="#">Good Team</a>	<a href="#">New Pool</a>
🏆 bertram	<a href="#">Schoolpool team Deux</a>	<a href="#">SchoolPool</a>
🏆 bertram	<a href="#">test11</a>	<a href="#">testpoolpleaseignore</a>
🏆 bertram	<a href="#">Create a team</a>	<a href="#">Test1</a>
🏆 bertram	<a href="#">Create a team</a>	<a href="#">Test1</a>
bertram	<a href="#">John bigelty</a>	<a href="#">Johnnys grand pool!</a>
bertram	<a href="#">bertrams team</a>	<a href="#">James funtimes</a>
bertram	<a href="#">stuff</a>	<a href="#">Hello</a>

Showing 1 to 10 of 10 entries Previous 1 Next

Create Pool

## View Pool

When on the view “My Pools” page you can click on an individual pool to see the the teams in that specific pool. The view pool page allows you to view all the teams that are a part of that particular pool, with links to individual teams. Here is where a user can view their standing against the other opposing owners involved in their pool.

HockeyPool! My Pools NHL Statistics a@b.c Logout

Top 10  
Kane, Patrick CHI G:8 A:16 +/-:3

### Pool Name: Tyrone

🏆 indicates the leader of the pool.

Show 2 entries Search:

Owner Name	Team Name	Fantasy points
🏆 bertram	<a href="#">Happy Team</a>	317.00
name	No team yet	0.00

Showing 1 to 2 of 2 entries Previous 1 Next

Enter Email Add Owner

## Leader of pool

If you are an leader of the pool (ie, you created the pool). You can add other owners via email from the “View Pool” page. This is not visible if you are not the owner of the pool.

It is assumed that owners who want to add people to their pool know the email address of the desired owner:

The screenshot shows the 'View Pool' page for 'Johnnys grand pool!'. At the top, it says 'Top 10' and 'Crosby, Sidney PIT G:18 A:16 +/-:3'. Below this, the pool name is 'Johnnys grand pool!'. A green icon indicates the leader of the pool. There is a search bar and a 'Show 10 entries' dropdown. The main table lists the top 10 owners with their names, team names, and fantasy points.

Owner Name	Team Name	Fantasy points
bertram	John biggity	285.00
tyrone	hello hello hello	75.00
John biggity	Johns Crude Crew	38.60
hello	No team yet	0.00

Showing 1 to 4 of 10 entries. Previous 1 Next

## Create Team

Once a user has gone through the ‘Create Pool’ page they will be redirected to the ‘Create Team’ page (Also reachable by clicking “create team” when viewing the ‘My Pools’ page). The table at the top of the page will show a list of all players they can add to their team. The user can order these players by any of the columns listed by clicking on the name of the column. The user can also search for a player's name by making use of the white text field in the top right corner directly above the table. Once the user has decided upon a player they simply need to select the ‘+’ on the right to add him to their fantasy team, once the user has done this that player will appear in the table at the bottom. In the top right hand corner above the search field it will show the remaining number of players which need to be added to the users team.

The screenshot shows the 'Create your team' page. At the top, it says 'Create your team' and 'Remaining allowed players: 4'. There is a search bar and a 'Create Team' button. The main table lists players with their names, teams, positions, games played, goals, assists, +/-, penalty mins, shots on goal, PP goals, GW goals, and a 'Pick' column with a '+' icon. A line graph is visible on the left side of the page.

Name	Team	Position	Games Played	Goals	Assists	+/-	Penalty Mins	Shots on Goal	PP goals	GW goals	Pick
Abdelkader, Justin	DET	F	22	4	4	-4	13	35	2	0	+
Aberg, Pontus	NSH	F	9	1	1	1	2	7	0	0	+
Acciari, Noel	BOS	F	12	0	2	1	4	8	0	0	+
Aho, Sebastian	CAR	F	23	3	8	-4	2	55	0	0	+
Anderson, Josh	CBJ	F	22	7	3	10	19	39	0	1	+
Andreoff, Andy	LA	F	9	0	0	-1	8	4	0	0	+
Andriighetto, Sven	MON	F	4	0	0	0	0	7	0	0	+
Anisimov, Artem	CHI	F	24	10	11	11	18	40	1	3	+
Armia, Joel	WPG	F	10	1	3	0	2	18	0	0	+
Arvidsson, Viktor	NSH	F	22	7	7	2	8	69	1	0	+

Showing 1 to 10 of 73 entries. Previous 1 Next

## View Team

Once you have created your team the website will redirect you to the view team page, here it will display your team name, players and their statistics and the total fantasy points your team has earned. The page will also specify in brackets whether you are viewing your team or another user's.

HockeyPool! My Pools NHL Statistics a@b.c Logout

Top 10  
Kane, Patrick CHI G:8 A:16 +/-:3

Pool name: Johnnys grand pool!

Team name: John biggity (My Team)

Show 10 entries Search:

Name	Team	Position	Games Played	Goals	Assists	+/-	Penalty Mins	Shots on Goal	PP goals	GW goals	Fantasy Points
Crosby, Sidney	PIT	F	18	16	9	3	8	64	5	3	85.20
Ovechkin, Alex	WSH	F	22	12	6	-1	16	90	4	4	75.80
PavelSKI, Joe	SJ	F	24	7	14	3	12	77	2	2	60.00
Karlsson, Erik	OTT	D	24	4	15	4	12	59	1	1	44.40
Thornton, Joe	SJ	F	24	2	11	1	6	24	0	0	19.60

Showing 1 to 5 of 5 entries

Previous 1 Next

Total FP: 285.00

## NHL Statistics

Selecting the "NHL Statistics" from the navigation bar will redirect you to the NHL Statistics page. This page displays all of the available nhl players so that you can view stats and trends of players who are not necessarily in your teams or pools. You can search the statistics based on multiple parameters by separating them with spaces.

HockeyPool! My Pools NHL Statistics a@b.c Logout

Top 10  
Kane, Patrick CHI G:8 A:16 +/-:3

NHL Statistics

Show 10 entries Separate search parameters with space: WSH 2016

Name	Team	Position	Games Played	Goals	Assists	+/-	Penalty Mins	Shots on Goal	PP goals	GW goals	Years
Alzner, Karl	WSH	D	22	2	2	7	10	25	0	0	2016
Backstrom, Nicklas	WSH	F	22	6	14	2	12	48	0	1	2016
Beagle, Jay	WSH	F	22	4	4	3	2	29	0	2	2016
Burakovsky, Andre	WSH	F	22	2	8	-2	4	37	0	0	2016
Carey, Paul	WSH	F	1	0	0	0	0	1	0	0	2016
Carlson, John	WSH	D	22	0	8	1	0	51	0	0	2016
Chorney, Taylor	WSH	D	3	0	1	1	0	6	0	0	2016
Connolly, Brett	WSH	F	14	2	1	-1	12	19	1	0	2016
Eller, Lars	WSH	F	21	2	1	-3	18	26	0	0	2016
Johansson, Marcus	WSH	F	22	9	6	5	4	40	2	4	2016

Showing 1 to 10 of 22 entries (Filtered from 2,293,143)

Previous 1 2 3 Next

## Appendix:

See attached data dump for the implementation of the database along with all instances used for testing. Data dump is a runnable sql file that will create and populate the hockeypool database if so desired.