

## Schemas for SE Hi-Run Application

### Client

Client Id	First Name*	Last Name*	Default Phone #	Default Address	Apt No.	Additional Addr. Info	Default Zip Code	City*	State*
-----------	-------------	------------	-----------------	-----------------	---------	-----------------------	------------------	-------	--------

This is all one table

Completed Runs	Total Runs	Is Admin
----------------	------------	----------

\*denotes required field

**Client Id PK**– auto-incrementing integer

**First Name/Last Name** – alphabetic string between 2 and 20 characters each

**Default Phone #** -optional alphanumeric formatted field e.g. (210) 555-1234

**Default Address** – optional alphanumeric field between 5 and 30 characters

**Apt No.** – Alphanumeric string, max 10 characters

**Additional Address Info** – Alphanumeric string for any additional information needed for delivery

**Default Zip Code** – optional numeric string/integer 5 characters long

**City** – alphabetic field between 3 and 20 characters long

**State** – alphabetic field between 4 and 20 characters long

**Completed Runs** – integer field that represents the number of runs to the client that have been completed

**Total Runs**– integer field that represents the number of runs that have been accepted by the client, Runs that the runner fails to complete will not be counted here

**Is Admin** – integer field will be left empty unless the user is an administrator

#### **Additional Notes:**

- Everybody that uses the app will create an initial client account
- Client Ratings will be out 100 percent and will be calculated by dividing the number of completed runs by the number of total runs
- The default fields are optional and may be changed by the client at any time. When requesting a run the client will have the option to use their default information
- At this point, creating a Admin Client User will require direct access to the Database to create

### Client Auth

Cid*	Username*	Password Hash*
------	-----------	----------------

\* denotes required field

**Cid** – foreign key to **Client Id** above

**Username** – alphanumeric string between 7 and 20 characters long

**Password Hash** – alphanumeric hash for the client's password max 50 characters long

**(Cid, Username) PK**

### Runner

Runner Id*	First Name*	Last Name*	Phone #*	City*	State*	Birthday*	Rating*	Completed Runs	Failed Runs	Is Admin
------------	-------------	------------	----------	-------	--------	-----------	---------	----------------	-------------	----------

\*denotes required field

\*\* may be broken into multiple fields, see below

**Runner Id PK**– auto-incrementing integer

**First Name/Last Name** – alphabetic string between 2 and 20 characters each

**Phone #** - alphanumeric formatted field e.g. (210) 555-1234

**City** – alphabetic field between 3 and 20 characters long

**State** – alphabetic field between 4 and 20 characters long

**Birthday** – alphanumeric string representing runner's birthday and age, format mm-dd-yyyy

**Rating** – double field that shows the current rating of the runner, max 5

**Completed Runs** – integer field that represents the number of runs to the client that have been completed

**Failed Runs** – integer field that represents the number of runs that have been accepted by the runner but that the runner failed to complete

**Is Admin** – integer field that will be left empty unless the user is an administrator

### **Additional Notes:**

- In order to be a runner, the user must be a client first and must apply to be a runner. The user will send his/her email address, SSN and possibly other personal info to us. We or somebody else will then perform a background check and then email them their runner account information.
- Ratings will be out 5 and will be given by clients that have been serviced by the runner. The initial rating will be set to 3.
- There should some sort of age limit in order to be a runner. Obviously a runner who is underage will not be able to perform certain tasks such as buying alcohol.
- Creating a Admin Runner User will require direct access to the Database to create

### Runner Auth

<b>Rid*</b>	<b>Username*</b>	<b>Password Hash*</b>
-------------	------------------	-----------------------

\* denotes required field

**Rid** – foreign key to **Runner Id** above

**Username** – alphanumeric string 6 characters long to be given by an Admin, format will be similar to UTSA logins and will consist of 3 letters, followed by 3 numbers

**Password Hash** – alphanumeric hash for the runner’s password max 50 characters long

**(Rid, Username) PK**

### Area

<b>Area Id*</b>	<b>City*</b>	<b>State*</b>	<b>Runners in Area*</b>
-----------------	--------------	---------------	-------------------------

**Area Id PK** – auto incrementing integer

**City** – alphabetic field between 3 and 20 characters long

**State** – alphabetic field between 4 and 20 characters long

**Runners in Area** - the number of runners in a particular area, when a runner logs in, this increments by 1, when a runner logouts, this decrements by 1

### **Additional Notes:**

- This is a just a preliminary way of tracking runners in a particular area
- This may not be good enough as more and more counties are registered

### Run

<b>Run Id*</b>	<b>Clnt Id*</b>	<b>Rner Id</b>	<b>Description*</b>	<b>Money Required*</b>	<b>Type*</b>	<b>Bid/Offer Amount</b>	<b>Time Needed*</b>	<b>Client Phone#*</b>
----------------	-----------------	----------------	---------------------	------------------------	--------------	-------------------------	---------------------	-----------------------

This is all one table

<b>Client Address*</b>	<b>Apt. No</b>	<b>Additional Addr. Info</b>	<b>City*</b>	<b>State*</b>	<b>Zip Code*</b>	<b>Time Posted*</b>	<b>Time Accepted</b>	<b>Estimated Time to Complete</b>
------------------------	----------------	------------------------------	--------------	---------------	------------------	---------------------	----------------------	-----------------------------------

\*denotes required field

**Run Id PK**– auto-incrementing integer

**Clnt Id** – foreign key to **Client Id** above

**Rner Id** – foreign key to **Runner Id** above

**Description** – alphanumeric client entered description of job/run, max 100 characters

**Money required** – alphabetic field that specifies whether a run/job requires money

**RunType**- alphabetic string labeling the type of job; if a job requires money only Gratuity options and Bid will be available to select, if no money is required then only Bid and Offer types will be selectable. Types listed below:

- **Gratuity w/ approval** – means client must approve the runner's acceptance of the job/run
- **Gratuity w/o approval** – no approval needed from client when a runner accepts a job
- **Bid** - runners will bid on the run/job and client will choose which to go with.
- **Offer w/ approval**– if a run does not require money and the client does not want to use the bidding process, the client may specify this type and the amount that they are offering to complete the job. The client must approve the runner's acceptance of the offer.
- **Offer w/o approval** – no approval need from client when a runner accepts the offer

**Bid/Offer Amount** – integer field that shows the Bid/offer amount. If Bid was selected, this field will remain empty until the client and runner have agreed on a bid; if Offer was selected then this will be the amount that is being offered. For gratuity types, this field will remain empty.

**Time needed** – client will specify a time that the job/run is needed or ASAP

**Client Phone #** - alphanumeric formatted field e.g. (210) 555-1234

**Client Address** –alphanumeric field between 5 and 30 characters

**Apt No.** – Alphanumeric string, max 10 characters

**Additional Address Info** – Alphanumeric string for any additional information needed for delivery

**City** – alphabetic field between 3 and 20 characters long

**State** – alphabetic field between 4 and 20 characters long

**Zip Code** –numeric string/integer 5 characters long

**Time Posted** - the time that the run/job was posted, will be to the minute if not second of posting

**Time Accepted** - the time that the run/job was accepted, will be to the minute if not second of posting

**Estimate Time to Complete** - the time entered by the runner that estimates to amount of time that the job will take to complete from the time that the job/run was accepted

**Additional Notes:**

- This will be a list of all runs that are either waiting for a runner to be committed and runs that already have a runner committed. On the app, when a runner has been committed to a run, the job/run is taken off the list of runs that are currently available for a runner to pickup, but will stay in this table until the run has been completed.
- When a run is initially posted, the Rner Id will be left empty until a runner has been committed to a run
- A valid credit card must be on file for a run to be posted by a client; we probably shouldn't have this data in the database but instead should store it through a third party (PayPal etc...)
- The gratuity for a job will automatically be set at %20 before tax of whatever the runner paid

- Bids are covered below
- We may need to limit to length of time that a job/run can stay posted, especially for offers

### **Bids**

<b>Ru Id*</b>	<b>Runr Id*</b>	<b>Amount*</b>
---------------	-----------------	----------------

\*denotes required field

**Ru Id** – foreign key to **Run Id** above

**Runr Id** – foreign key to **Runner Id** above

**Amount** – integer that represents the amount of the bid

**(Ru Id, Runr Id) PK**

#### **Additional Notes:**

- This table will only represent Bids on runs that have not been accepted by the client. Once a bid has been accepted all Bids associated with that run will be deleted and the winning bid amount will be stored in **Run**

### **Run Log\*\***

<b>Time Completed*</b>
------------------------

\*denotes required field

\*\*This table will have the same fields as **Run** with the addition of the above one

**Time Completed** - the time that the run/job was completed, will be to the minute if not second of completion

#### **Additional Notes:**

- An entry in this table will created once a runner has confirmed a run has been completed. The associated entry in **Run** will be removed as well.