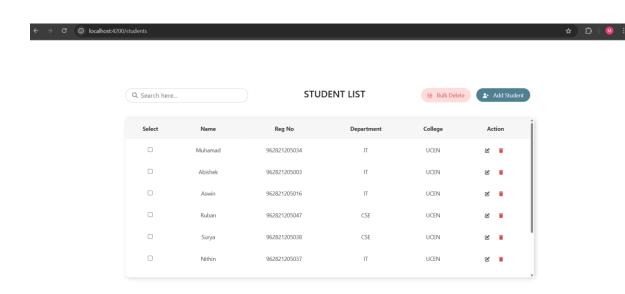
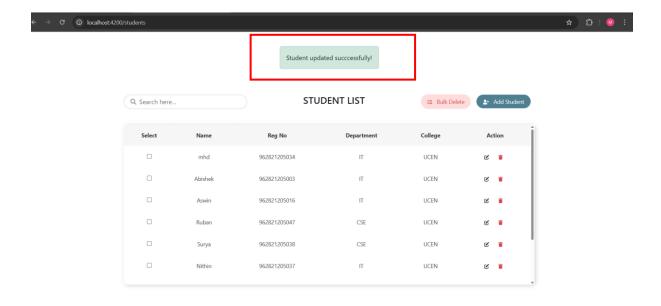
OUTPUT:

ember-vertical-collection

```
<VerticalCollection @estimateHeight={{50}} @items={{@students}} @key="reg"</pre>
               @containerSelector=".table-container" as |student|>
               <input type="checkbox"/>
                   {{student.name}}
                   {{student.reg}}
                   {{student.dept}}
                   {{student.clg}}
                   <button class="btn-ed edit" type="button" {{on "click"</pre>
(fn @editRow student.reg)}}>
                          <i class="fa-solid fa-pen-to-square"></i></i>
                      <button class="btn-ed delete" type="button" {{on</pre>
"click" (fn @deleteRow student.reg)}}>
                          <i class="fa-solid fa-trash"></i></i>
                      </button>
                   </VerticalCollection>
```



ember-cli-flash

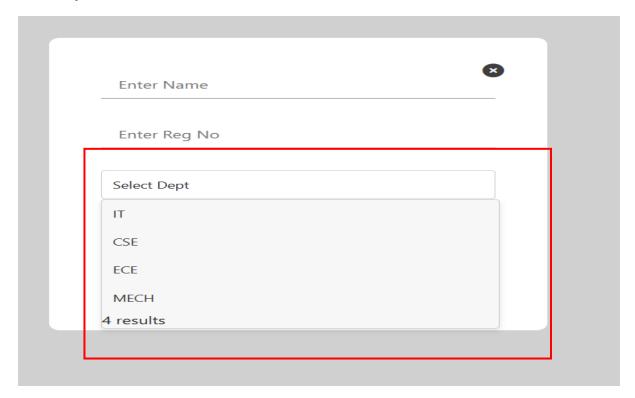


ember-click-outside

ember-concurrency

```
@task
    *searchTable(event) {
        let input = event.target.value.toLowerCase();
        yield timeout(300);
        this.students.searchStudents(input);
    }
}
```

ember-power-select



ember-truth-helpers

```
{{#if (and @students (gt (get @students "length") 0))}}
```

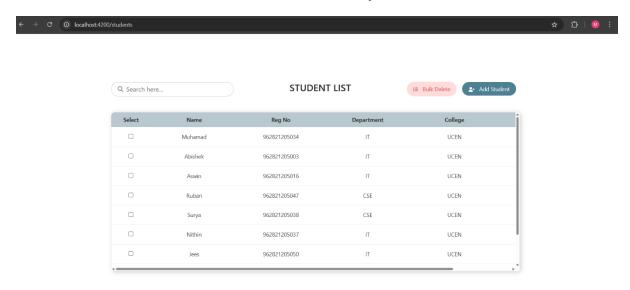
ember-keyboard

```
<div id="formCont" {{on-key 'Enter' this.handleEnter}} {{on-key 'Escape'
@closeForm}}>
```

liquid-fire

```
<div
    class="{{if (or (eq this.currentRoute 'students.add') (eq
this.currentRoute 'students.edit')) 'full-screen-outlet' 'normal-outlet'}}">
    {{liquid-outlet}}
</div>
```

Bidirectional scrollable div and scrollable body:



index.html

```
<!DOCTYPE html>
<html>
 <head>
  <meta charset="utf-8">
  <title>EmberStudentList</title>
  <meta name="description" content="">
  <meta name="viewport" content="width=device-width, initial-scale=1">
  {{content-for "head"}}
  <link integrity="" rel="stylesheet" href="{{rootURL}}assets/vendor.css">
  <link integrity="" rel="stylesheet" href="{{rootURL}}assets/ember-student-list.css">
  <link rel="stylesheet" href="https://cdnjs.cloudflare.com/ajax/libs/font-</pre>
awesome/6.7.2/css/all.min.css" integrity="sha512-
Evv84Mr4kqVGRNSgIGL/F/aIDqQb7xQ2vcrdIwxfjThSH8CSR7PBEakCr51Ck+w+/U6swU2Im1v
VX0SVk9ABhg==" crossorigin="anonymous" referrerpolicy="no-referrer" />
  k rel="stylesheet"
href="https://cdn.jsdelivr.net/npm/bootstrap@5.3.0/dist/css/bootstrap.min.css">
```

```
{{content-for "head-footer"}}
 </head>
 <body>
  {{content-for "body"}}
  <script src="{{rootURL}}assets/vendor.js"></script>
  <script src="{{rootURL}}assets/ember-student-list.js"></script>
  {{content-for "body-footer"}}
 </body>
</html>
templates/application.hbs
{{outlet}}
templates/students.hbs
{{!-- Implemented ember-cli-flash --}}
{{#each this.flashMessages.queue as |flash|}}
<FlashMessage @flash={{flash}} @messageStyle='bootstrap' />
{{/each}}
{{!-- Implemented ember-truth-helpers --}}
<div
  class="{{if (or (eq this.currentRoute 'students.add') (eq this.currentRoute 'students.edit'))
'full-screen-outlet' 'normal-outlet'}}">
{{!-- Implemented liquid-fire --}}
  {{liquid-outlet}}
</div>
```

```
<div class="container">
  <div class="search-dlt-cont">
    <div class="search-cont">
      <i class="fa-solid fa-magnifying-glass"></i>
      <input type="text" id="search" placeholder="Search here..." {{on "keyup"
this.handleSearch}}>
    </div>
    <h4>STUDENT LIST</h4>
    <div>
      <button {{on "click" this.bulkDelete}} class="btn-cd dlt">
        <i class="fa-solid fa-list-check"></i> Bulk Delete
      </button>
      <LinkTo @route="students.add" class="btn-cd">
        <i class="fa-solid fa-user-plus"></i> Add Student
      </LinkTo>
    </div>
  </div>
  <StudentList @students={{this.students.filteredStudents}} @deleteRow={{this.deleteRow}}
@editRow={{this.editRow}}
    @updateSelection={{this.updateSelection}} />
</div>
templates/students/add.hbs
<div id="overlay"></div>
{{!-- Implemented ember-click-outside--}}
<div {{on-click-outside this.closeForm}}>
```

```
<StudentForm @addRow={{this.addRow}} @closeForm={{this.closeForm}} /> </div>
```

templates/students/edit.hbs

```
<div id="overlay"></div>
<div {{on-click-outside this.closeForm}}>
    <StudentForm @editStudent={{this.model}} @students={{this.students.students}}
@saveStudent={{this.saveStudent}}
    @updateStudents={{this.updateStudents}} @closeForm={{this.closeForm}} />
</div>
```

services/students.js

```
];
  @tracked filteredStudents = this.students;
  addStudent(student) {
    this.students = [...this.students, student];
    this.filteredStudents = this.students;
  }
  searchStudents(query) {
    query = query.toLowerCase();
    this.filteredStudents = this.students.filter(student => {
      const reg = student.reg ? student.reg.toString().toLowerCase() : ";
      return student.name.toLowerCase().includes(query) | |
         reg.includes(query) ||
         student.dept.toLowerCase().includes(query) ||
         student.clg.toLowerCase().includes(query);
    });
  }
}
routes/students.js
import Route from '@ember/routing/route';
export default class StudentsRoute extends Route {}
routes/students/add.js
import Route from '@ember/routing/route';
import { inject as service } from '@ember/service';
```

```
export default class StudentsAddRoute extends Route {
  @service students;
  model() {
    return { students:this.students.students, newStudent: { name: ", reg: ", dept: ", clg: " } };
  }
}
routes/students/edit.js
import Route from '@ember/routing/route';
import { inject as service } from '@ember/service';
export default class StudentsEditRoute extends Route {
  @service students;
  model(params) {
    return this.students.students.find(student => student.reg == Number(params.reg));
  }
}
controllers/students.js
import Controller from '@ember/controller';
import { action } from '@ember/object';
import { tracked } from '@glimmer/tracking';
import { service } from '@ember/service';
import { task, timeout } from 'ember-concurrency';
export default class StudentsController extends Controller {
  @service router;
  @service students;
```

```
@service flashMessages;
  @tracked isFormVisible = false;
  @tracked editStudent = null;
  get currentRoute() {
    return this.router.currentRouteName;
   }
// Implemented ember-concurrency
  @task
  *searchTable(event) {
    let input = event.target.value.toLowerCase();
    yield timeout(300);
    this.students.searchStudents(input);
  }
  @action handleSearch(event) {
    this.searchTable.perform(event);
  }
  @action bulkDelete() {
    let checkboxes = document.querySelectorAll("#table input[type='checkbox']:checked");
    if (!checkboxes.length) {
      this.flashMessages.warning('Select one or more rows to bulk delete', { timeout: 2000
});
      return;
    }
```

```
checkboxes.forEach(checkbox => {
      let row = checkbox.parentElement.parentElement;
      this.deleteRow(row.cells[2].textContent);
      row.remove();
    });
  }
  @action deleteRow(reg) {
    this.students.filteredStudents = this.students.filteredStudents.filter(student =>
student.reg !== reg);
  }
  @action editRow(reg) {
    this.editStudent = this.students.filteredStudents.find(student => student.reg === reg);
    this.router.transitionTo('students.edit', reg);
  }
}
```

controllers/students/add.js

```
import Controller from '@ember/controller';
import { service } from '@ember/service';
import { action } from '@ember/object';

export default class StudentsAddController extends Controller {
    @service router;
    @service students;
    @service flashMessages;
```

```
@action addRow(student) {
    this.students.addStudent(student);
    this.router.transitionTo('students');
//Implemented ember-cli-flash
    this.flashMessages.success("Student added succcessfully!");
  }
  @action closeForm() {
    this.router.transitionTo('students');
  }
}
controllers/students/edit.js
import Controller from '@ember/controller';
import { service } from '@ember/service';
import { action } from '@ember/object';
export default class StudentsEditController extends Controller {
  @service router;
  @service students;
  @service flashMessages;
  @action updateStudents(updatedStudents) {
    this.students.filteredStudents = updatedStudents;
    this.router.transitionTo('students');
    this.flashMessages.success("Student updated succcessfully!");
```

```
}
  @action closeForm() {
    this.router.transitionTo('students');
  }
}
components/student-form.hbs
{{!-- Implemented ember-keyboard --}}
<div id="formCont" {{on-key 'Enter' this.handleEnter}} {{on-key 'Escape' @closeForm}}>
  <span id="close-btn" {{on "click" @closeForm}}>
    <i class="fa-solid fa-circle-xmark"></i>
  </span>
  <input type="text" value={{this.name}} {{on "input" this.updateName}}</pre>
placeholder="Enter Name">
  <input type="number" value={{this.reg}} {{on "input" this.updateReg}} placeholder="Enter
Reg No">
  {{!-- Implemented ember-power-select --}}
  <PowerSelect @options={{this.departments}} @selected={{this.dept}}
```

<input type="text" value={{this.clg}} {{on "input" this.updateClg}} placeholder="Enter
College">

@renderInPlace={{true}} @triggerClass="custom-power-select" as

@onChange={{this.updateDept}}

|department|>{{department}}</PowerSelect>

components/student-list.hbs

```
<div class="table-container">
 <thead>
    Select
      Name
      Reg No
      Department
      College
      Action
    </thead>
   {{#if (get @students "length")}}
{{!-- Implemented @html-next/vertical-collection --}}
    <VerticalCollection @estimateHeight={{50}} @items={{@students}} @key="reg"</pre>
```

```
@containerSelector=".table-container" as |student|>
       <input type="checkbox"/>
        {{student.name}}
        {{student.reg}}
        {{student.dept}}
        {{student.clg}}
        <button class="btn-ed edit" type="button" {{on "click" (fn @editRow</pre>
student.reg)}}>
            <i class="fa-solid fa-pen-to-square"></i>
          </button>
          <button class="btn-ed delete" type="button" {{on "click" (fn @deleteRow
student.reg)}}>
            <i class="fa-solid fa-trash"></i>
          </button>
        </VerticalCollection>
     {{else}}
     No students found
     {{/if}}
   </div>
```

components/student-form.js

```
import Component from '@glimmer/component';
import { action } from '@ember/object';
import { tracked } from '@glimmer/tracking';
import { service } from '@ember/service';
export default class StudentFormComponent extends Component {
  @tracked name = this.args.editStudent?.name | | ";
  @tracked reg = this.args.editStudent?.reg | | ";
  @tracked dept = this.args.editStudent?.dept || 'Select Dept';
  @tracked clg = this.args.editStudent?.clg || ";
  @tracked isEditing = !!this.args.editStudent;
  @service flashMessages;
  departments = ['IT', 'CSE', 'ECE', 'MECH'];
  @action updateName(event) {
    this.name = event.target.value;
 }
  @action updateReg(event) {
    this.reg = event.target.value;
 }
  @action updateDept(selectedDept) {
    this.dept = selectedDept;
 }
```

```
@action updateClg(event) {
  this.clg = event.target.value;
}
@action saveStudent() {
  if (!this.name | | !this.reg | | !this.dept | | !this.clg) {
    this.flashMessages.warning("Fill all the details");
    return;
  }
  if (this.isEditing) {
    let updatedStudents = this.args.students.map(student =>
       student.reg === this.reg
         ? { ...student, name: this.name, dept: this.dept, clg: this.clg }
         : student
    );
    this.args.updateStudents(updatedStudents);
  } else {
    this.args.addRow({
       name: this.name,
       reg: this.reg,
       dept: this.dept,
       clg: this.clg
    });
  }
  this.args.closeForm();
```

```
}
  @action
  handleEnter(event) {
    event.preventDefault();
    if (event.key === "Enter") {
      this.saveStudent();
    }
  }
}
styles/app.css
/* Ember supports plain CSS out of the box. More info:
https://cli.emberjs.com/release/advanced-use/stylesheets/ */
.custom-power-select {
  border: 1px solid #ccc;
  padding: 10px;
  cursor: pointer;
  background-color: white;
  border-radius: 4px;
  font-size: 14px;
  position: relative;
```

}

```
.ember-basic-dropdown-content {
  background: rgb(247, 247, 247);
  border: 1px solid #ccc;
  box-shadow: 0px 4px 6px rgba(0, 0, 0, 0.1);
  border-radius: 4px;
  position: absolute;
  width: 80%;
  max-height: 200px;
  overflow-y: auto;
}
.ember-power-select-option {
  padding: 10px;
  cursor: pointer;
  font-size: 14px;
  color: #333;
}
.ember-power-select-option[aria-selected="true"] {
  background-color: #cfcfcf;
}
.ember-power-select-option:hover {
  background-color: #f1f1f1;
}
.ember-power-select-options {
  list-style: none;
```

```
margin: 0;
  padding: 0;
}
.ember-power-select-trigger {
  display: flex;
  align-items: center;
  justify-content: space-between;
}
body {
  display: flex;
  justify-content: center;
  align-items: center;
  flex-direction: column;
  height: 100vh;
  font-family: Arial, Helvetica, sans-serif;
}
#overlay {
  position: fixed;
  top: 0;
  left: 0;
  height: 100%;
  width: 100%;
  background-color: rgba(110, 110, 110, 0.2);
  z-index: 1000;
}
```

```
.flash-message {
  z-index: 1005;
}
.container {
  display: flex;
  align-items: center;
  flex-direction: column;
  padding: 2rem;
  background-color: #fff;
  border-radius: 10px;
  width: 70%;
  height: 80vh;
  position: relative;
}
#formCont,
table {
  margin: 2rem;
}
.normal-outlet {
  width: 100%;
  height: auto;
  position: relative;
}
```

```
. full\text{-}screen\text{-}outlet \, \{
  position: fixed;
  top: 0;
  left: 0;
  width: 100vw;
  height: 100vh;
  background-color: rgba(255, 255, 255, 1);
  z-index: 1000;
}
#formCont {
  display: flex;
  flex-direction: column;
  gap: 2rem;
  top: 15%;
  left: 35%;
  background-color: white;
  padding: 3rem;
  border-radius: 10px;
  width: 30%;
  z-index: 2000;
  position: relative;
  margin: 10rem 0;
}
.decision {
  display: flex;
  justify-content: flex-end;
```

```
}
#close-btn {
  cursor: pointer;
  position: absolute;
  top: 2rem;
  right: 2rem;
  color: #3e3e3e;
  font-size: 20px;
}
input {
  margin-right: 1rem;
  padding: 0.5rem 1rem;
  border: none;
  border-bottom: 1px solid #868686;
  background-color: #fff;
  outline: none;
}
input[type="text"]:focus {
  border: none;
  border-bottom: 1px solid #868686;
}
input[type="checkbox"] {
  cursor: pointer;
}
```

```
.table-container {
  overflow: auto;
  width: 80%;
  border-radius: 10px;
  box-shadow: 3px 2px 10px #d3d3d3;
  margin: 1.5rem;
  background: white;
  border: 1px solid #e4e4e4;
  scrollbar-width: thin;
}
table {
  margin: 0;
  background-color: #fff;
  border-radius: 10px;
  border-collapse: collapse;
  color: #3e3e3e;
  width: 100%;
  min-width: 1200px;
  table-layout: fixed;
}
thead {
  position: sticky;
  top: 0;
  background-color: #b8c8ce;
```

```
z-index: 5;
  text-align: center;
  font-size: 14px;
}
tbody {
  overflow-y: auto;
  width: 100%;
  scrollbar-width: thin;
}
tr th {
  padding: 0.5rem;
}
table tr {
  border-bottom: 1px solid #eeeded;
}
td {
  padding: 0.8rem;
  font-size: 14px;
  text-align: center;
  word-wrap: break-word;
}
th:first-child {
  background-color: #b8c8ce;
```

```
}
td:first-child {
  background-color: #ffffff;
}
th:first-child, td:first-child {
  position: sticky;
  left: 0;
  top: 0;
  z-index: 3;
  width: 100px;
}
.btn-cd {
  padding: 0.5rem 1rem;
  border-radius: 20px;
  border: none;
  background-color: #4f8091;
  color: white;
  cursor: pointer;
  font-size: 14px;
  margin-right: 10px;
  text-decoration: none;
}
.btn-cd i {
  font-size: 12px;
```

```
}
i {
  margin-right: 0.5rem;
}
.dlt {
  background-color: #ffdcdc;
  color: #d84949;
}
.cancel {
  background-color: white;
  color: black;
  border: 1px solid #9f9f9f;
}
.btn-ed {
  background: transparent;
  border: none;
  cursor: pointer;
}
.delete {
  color: #d84949;
}
.edit {
```

```
color: #3e3e3e;
}
button i {
  font-size: 12px;
}
.search-dlt-cont {
  width: 80%;
  display: flex;
  justify-content: space-between;
  align-items: center;
  margin: 1rem 0;
  gap: 1rem;
}
#search {
  padding: 5px 0;
  border: none;
  width: 100%;
}
.search-cont {
  display: flex;
  align-items: center;
  border: 1px solid #ccc;
  width: 30%;
  color: #878787;
```

```
padding: 0 1rem;
border-radius: 20px;
}
.search-cont i {
  font-size: 14px;
}
```

package.json

```
"ember-auto-import": "^2.10.0'
"ember-cli": "~5.9.0",
"ember-cli-app-version": "^7.6
```

```
"ember-source": "~5.9.0",
```