

## Grid System (updated Card Gap)

CSS Grid Layout excels at dividing a page into major regions or defining the relationship in terms of size, position, and layer, between parts of a control built from HTML primitives. Like tables, grid layout enables an author to align elements into columns and rows.

Create new file `_grid.scss` in shinabi folder (**black highlight updated part**)

```
@use "sass:math";

$grid-columns: 12;

$grid-gaps: (
  "0": 0,
  "1": 10px,
  "2": 20px,
  "3": 30px,
);

$layout-values: flex-start, flex-end, center, space-between, space-around;
//list variable

// base layout classes
.container {
  width: 100%;
  max-width: 1200px;
  margin: 0 auto;
  padding: 0 20px;
  box-sizing: border-box;
}

.row {
  display: flex;
  flex-flow: row wrap;
}

// grid gaps
@each $key, $val in $grid-gaps {
  .gap-#{$key} > * {
    padding: $val;
  }
  .gap-#{$key} {
    margin-left: -$val;
    margin-right: -$val;
  }
}
```

```

// justify content classes
@each $val in $layout-values {
  .justify-#{ $val } {
    justify-content: $val;
  }
}

// col classes
@include xs {
  @for $i from 1 through $grid-columns {
    .col-#{ $i }-xs {
      box-sizing: border-box;
      flex-grow: 0;
      width: math.div($i * 100%, $grid-columns);
    }
  }
}

@include sm {
  @for $i from 1 through $grid-columns {
    .col-#{ $i }-sm {
      box-sizing: border-box;
      flex-grow: 0;
      width: math.div($i * 100%, $grid-columns);
    }
  }
}

@include md {
  @for $i from 1 through $grid-columns {
    .col-#{ $i }-md {
      box-sizing: border-box;
      flex-grow: 0;
      width: math.div($i * 100%, $grid-columns);
    }
  }
}

@include lg {
  @for $i from 1 through $grid-columns {
    .col-#{ $i }-lg {
      box-sizing: border-box;
      flex-grow: 0;
      width: math.div($i * 100%, $grid-columns);
    }
  }
}

```

```

}

@include xl {
  @for $i from 1 through $grid-columns {
    .col-#{ $i }-xl {
      box-sizing: border-box;
      flex-grow: 0;
      width: math.div($i * 100%, $grid-columns);
    }
  }
}

```

Auto Generate classes index.css file (**black highlight updated part**)

```

.container {
  width: 100%;
  max-width: 1200px;
  margin: 0 auto;
  padding: 0 20px;
  box-sizing: border-box;
}

.row {
  display: flex;
  flex-flow: row wrap;
}

.gap-0 > * {
  padding: 0;
}

.gap-0 {
  margin-left: 0;
  margin-right: 0;
}

.gap-1 > * {
  padding: 10px;
}

.gap-1 {
  margin-left: -10px;
  margin-right: -10px;
}

.gap-2 > * {
  padding: 20px;
}

```

```
.gap-2 {
  margin-left: -20px;
  margin-right: -20px;
}

.gap-3 > * {
  padding: 30px;
}

.gap-3 {
  margin-left: -30px;
  margin-right: -30px;
}

.justify-flex-start {
  justify-content: flex-start;
}

.justify-flex-end {
  justify-content: flex-end;
}

.justify-center {
  justify-content: center;
}

.justify-space-between {
  justify-content: space-between;
}

.justify-space-around {
  justify-content: space-around;
}

@media (min-width: 0) {
  .col-1-xs {
    box-sizing: border-box;
    flex-grow: 0;
    width: 8.3333333333%;
  }
  .col-2-xs {
    box-sizing: border-box;
    flex-grow: 0;
    width: 16.6666666667%;
  }
  .col-3-xs {
```

```
    box-sizing: border-box;
    flex-grow: 0;
    width: 25%;
}
.col-4-xs {
    box-sizing: border-box;
    flex-grow: 0;
    width: 33.333333333%;
}
.col-5-xs {
    box-sizing: border-box;
    flex-grow: 0;
    width: 41.6666666667%;
}
.col-6-xs {
    box-sizing: border-box;
    flex-grow: 0;
    width: 50%;
}
.col-7-xs {
    box-sizing: border-box;
    flex-grow: 0;
    width: 58.333333333%;
}
.col-8-xs {
    box-sizing: border-box;
    flex-grow: 0;
    width: 66.6666666667%;
}
.col-9-xs {
    box-sizing: border-box;
    flex-grow: 0;
    width: 75%;
}
.col-10-xs {
    box-sizing: border-box;
    flex-grow: 0;
    width: 83.333333333%;
}
.col-11-xs {
    box-sizing: border-box;
    flex-grow: 0;
    width: 91.6666666667%;
}
.col-12-xs {
    box-sizing: border-box;
    flex-grow: 0;
    width: 100%;
}
```

```
}  
}  
@media (min-width: 480px) {  
  .col-1-sm {  
    box-sizing: border-box;  
    flex-grow: 0;  
    width: 8.3333333333%;  
  }  
  .col-2-sm {  
    box-sizing: border-box;  
    flex-grow: 0;  
    width: 16.6666666667%;  
  }  
  .col-3-sm {  
    box-sizing: border-box;  
    flex-grow: 0;  
    width: 25%;  
  }  
  .col-4-sm {  
    box-sizing: border-box;  
    flex-grow: 0;  
    width: 33.3333333333%;  
  }  
  .col-5-sm {  
    box-sizing: border-box;  
    flex-grow: 0;  
    width: 41.6666666667%;  
  }  
  .col-6-sm {  
    box-sizing: border-box;  
    flex-grow: 0;  
    width: 50%;  
  }  
  .col-7-sm {  
    box-sizing: border-box;  
    flex-grow: 0;  
    width: 58.3333333333%;  
  }  
  .col-8-sm {  
    box-sizing: border-box;  
    flex-grow: 0;  
    width: 66.6666666667%;  
  }  
  .col-9-sm {  
    box-sizing: border-box;  
    flex-grow: 0;  
    width: 75%;  
  }  
}
```

```
.col-10-sm {
  box-sizing: border-box;
  flex-grow: 0;
  width: 83.3333333333%;
}
.col-11-sm {
  box-sizing: border-box;
  flex-grow: 0;
  width: 91.6666666667%;
}
.col-12-sm {
  box-sizing: border-box;
  flex-grow: 0;
  width: 100%;
}
}
@media (min-width: 720px) {
.col-1-md {
  box-sizing: border-box;
  flex-grow: 0;
  width: 8.3333333333%;
}
.col-2-md {
  box-sizing: border-box;
  flex-grow: 0;
  width: 16.6666666667%;
}
.col-3-md {
  box-sizing: border-box;
  flex-grow: 0;
  width: 25%;
}
.col-4-md {
  box-sizing: border-box;
  flex-grow: 0;
  width: 33.3333333333%;
}
.col-5-md {
  box-sizing: border-box;
  flex-grow: 0;
  width: 41.6666666667%;
}
.col-6-md {
  box-sizing: border-box;
  flex-grow: 0;
  width: 50%;
}
.col-7-md {
```

```
    box-sizing: border-box;
    flex-grow: 0;
    width: 58.3333333333%;
  }
  .col-8-md {
    box-sizing: border-box;
    flex-grow: 0;
    width: 66.6666666667%;
  }
  .col-9-md {
    box-sizing: border-box;
    flex-grow: 0;
    width: 75%;
  }
  .col-10-md {
    box-sizing: border-box;
    flex-grow: 0;
    width: 83.3333333333%;
  }
  .col-11-md {
    box-sizing: border-box;
    flex-grow: 0;
    width: 91.6666666667%;
  }
  .col-12-md {
    box-sizing: border-box;
    flex-grow: 0;
    width: 100%;
  }
}
@media (min-width: 960px) {
  .col-1-lg {
    box-sizing: border-box;
    flex-grow: 0;
    width: 8.3333333333%;
  }
  .col-2-lg {
    box-sizing: border-box;
    flex-grow: 0;
    width: 16.6666666667%;
  }
  .col-3-lg {
    box-sizing: border-box;
    flex-grow: 0;
    width: 25%;
  }
  .col-4-lg {
    box-sizing: border-box;
```



```
    flex-grow: 0;
    width: 33.3333333333%;
  }
  .col-5-lg {
    box-sizing: border-box;
    flex-grow: 0;
    width: 41.6666666667%;
  }
  .col-6-lg {
    box-sizing: border-box;
    flex-grow: 0;
    width: 50%;
  }
  .col-7-lg {
    box-sizing: border-box;
    flex-grow: 0;
    width: 58.3333333333%;
  }
  .col-8-lg {
    box-sizing: border-box;
    flex-grow: 0;
    width: 66.6666666667%;
  }
  .col-9-lg {
    box-sizing: border-box;
    flex-grow: 0;
    width: 75%;
  }
  .col-10-lg {
    box-sizing: border-box;
    flex-grow: 0;
    width: 83.3333333333%;
  }
  .col-11-lg {
    box-sizing: border-box;
    flex-grow: 0;
    width: 91.6666666667%;
  }
  .col-12-lg {
    box-sizing: border-box;
    flex-grow: 0;
    width: 100%;
  }
}
@media (min-width: 1200px) {
  .col-1-xl {
    box-sizing: border-box;
    flex-grow: 0;
```

```
    width: 8.3333333333%;
}
.col-2-xl {
    box-sizing: border-box;
    flex-grow: 0;
    width: 16.6666666667%;
}
.col-3-xl {
    box-sizing: border-box;
    flex-grow: 0;
    width: 25%;
}
.col-4-xl {
    box-sizing: border-box;
    flex-grow: 0;
    width: 33.3333333333%;
}
.col-5-xl {
    box-sizing: border-box;
    flex-grow: 0;
    width: 41.6666666667%;
}
.col-6-xl {
    box-sizing: border-box;
    flex-grow: 0;
    width: 50%;
}
.col-7-xl {
    box-sizing: border-box;
    flex-grow: 0;
    width: 58.3333333333%;
}
.col-8-xl {
    box-sizing: border-box;
    flex-grow: 0;
    width: 66.6666666667%;
}
.col-9-xl {
    box-sizing: border-box;
    flex-grow: 0;
    width: 75%;
}
.col-10-xl {
    box-sizing: border-box;
    flex-grow: 0;
    width: 83.3333333333%;
}
.col-11-xl {
```

```

    box-sizing: border-box;
    flex-grow: 0;
    width: 91.6666666667%;
  }
  .col-12-xl {
    box-sizing: border-box;
    flex-grow: 0;
    width: 100%;
  }
}

```

Index.html file (black highlight updated part)

```

<!-- grid system -->
  <div class="container">

    <h2 class="mb-2">Grid System</h2>
    <div class="row gap-2 justify-center ">
      <div class="col-12-xs col-5-sm col-3-xl">
        <div class="card">
          <h3 class="card-title">Hello, ninjas</h3>
          <p class="card-body">Lorem ipsum, dolor sit amet consectetur
adipisicing elit.</p>
          <button class="btn-outlined-orange text-orange text-hover-
white">click</button>
        </div>
      </div>
      <div class="col-12-xs col-5-sm col-3-xl">
        <div class="card">
          <h3 class="card-title">Hello, ninjas</h3>
          <p class="card-body">Lorem ipsum, dolor sit amet consectetur
adipisicing elit.</p>
          <button class="btn-outlined-orange text-orange text-hover-
white">click</button>
        </div>
      </div>
      <div class="col-12-xs col-5-sm col-3-xl">
        <div class="card">
          <h3 class="card-title">Hello, ninjas</h3>
          <p class="card-body">Lorem ipsum, dolor sit amet consectetur
adipisicing elit.</p>
          <button class="btn-outlined-orange text-orange text-hover-
white">click</button>
        </div>
      </div>
      <div class="col-12-xs col-5-sm col-3-xl">

```

```

        <div class="card">
          <h3 class="card-title">Hello, ninjas</h3>
          <p class="card-body">Lorem ipsum, dolor sit amet consectetur
adipisicing elit.</p>
          <button class="btn-outlined-orange text-orange text-hover-
white">click</button>
        </div>
      </div>
    </div>
  // end container////

```

## Browser output (**updated**):

### This is a title

Lorem ipsum dolor sit, amet consectetur adipisicing elit. In sunt, quo totam aliquam praesentium ducimus tempore sapiente quia nulla optio? Lorem ipsum, dolor sit amet consectetur adipisicing elit. Libero laboriosam laborum exercitationem autem commodi voluptas odio aliquid ut velit doloremque minima, quaerat dolores, corporis consequuntur totam nam id veniam maxime.

## Grid System

### Hello, ninjas

Lorem ipsum, dolor sit amet consectetur adipisicing elit.

click

### Hello, ninjas

Lorem ipsum, dolor sit amet consectetur adipisicing elit.

click

### Hello, ninjas

Lorem ipsum, dolor sit amet consectetur adipisicing elit.

click

### Hello, ninjas

Lorem ipsum, dolor sit amet consectetur adipisicing elit.

click

Try to check screen resize