

# Web Design

COMS10012 / COMSM0085

Software Tools

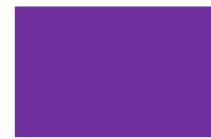
# Design – the hard part

# Design

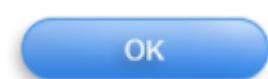
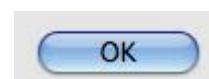
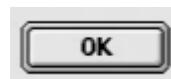
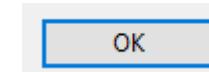
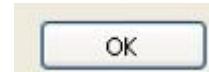
“Thinking about design is hard, but not thinking about it can be disastrous.”

*- Ralph Caplan*

# Design and Cultures

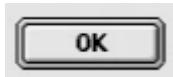


# Design and fashion



Design principle 1:

**test with your intended audience!**

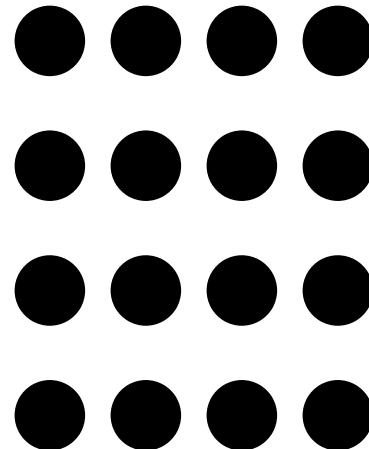
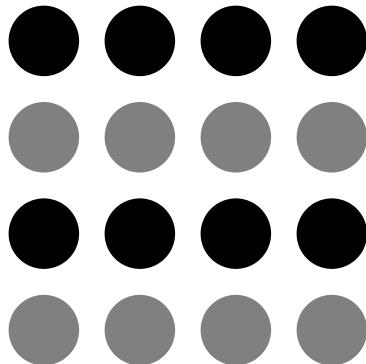
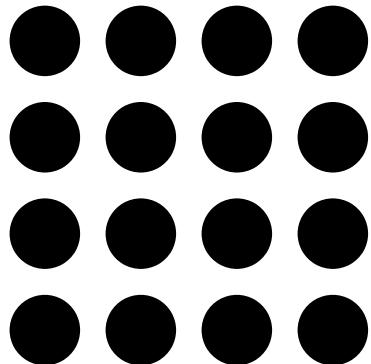


# Some More Design Principles

# Gestalt (1)



# Gestalt (2)



# Whitespace

gnats	gram	\$13.65
	each	.01
gnu	stuffed	92.50
emu		33.33
armadillo	frozen	8.99

Item		
Animal	Description	Price (\$)
Gnat	per gram	13.65
	each	0.01
Gnu	stuffed	92.50
Emu	stuffed	33.33
Armadillo	frozen	8.99

Item		
Animal	Description	Price (\$)
Gnat	per gram	13.65
	each	0.01
Gnu	stuffed	92.50
Emu	stuffed	33.33
Armadillo	frozen	8.99

TeX manual

booktabs

# Text width

Guidelines you may see:

- 50–60 characters
- two full alphabets
- 12 words
- 30 em

Publication quality tables in L<sup>A</sup>T<sub>E</sub>X\*

Simon Fear  
300A route de Meyrin  
Meyrin  
Switzerland

Printed January 14, 2020

**Abstract**

This article describes some additional commands to enhance the quality of tables in L<sup>A</sup>T<sub>E</sub>X. Guidelines are given as to what constitutes a good table in this context. The package `booktabs` (Version 1.61) of the `booktabs` package, described herein, adds some enhancements to the 1995 release (Version 1.00), most notably `longtable` compatibility.

Releases (Versions 1.61S, 1.6180, 1.61803 and 1.618033) are only bug patches, support for the `colortbl` package and better compatibility with `longtable`.<sup>1</sup>

**1 Introduction**

The routines described below are to enable the easy production of tables such as should appear in published scientific books and journals. What distinguishes these from plain L<sup>A</sup>T<sub>E</sub>X tables is the default use of additional space above and below rules, and rules of varying ‘thickness’. What further distinguishes them from the tables many people *do* produce using L<sup>A</sup>T<sub>E</sub>X is the absence of vertical rules and double rules.

I must draw a clear distinction between what I call here a *formal table*, which is a set of values in labelled columns, as distinct from what I will call a *tableau*. The latter is the kind of thing illustrated in the L<sup>A</sup>T<sub>E</sub>X manual, and increasingly common as the output of many database management systems; it will probably have icons in abundance, and no doubt use colour too. The layout of such a *tableau* is determined (hopefully) as a one-off, given a jumble of material the designer is trying to combine into a meaningful configuration. But the layout of a *table*

\*This file has version number v1.61803398, (converging to phi, the golden ratio), last revised 2020/01/12.  
<sup>1</sup>By Danie Els (`danie@sun.ac.za`) in the absence of the author.

1





# Text width

## Corbyn urges voters to deliver 'shock to the establishment'

- Labour leader uses final speech to outline 'truly historic choice'
- Johnson calls on electorate to 'put the uncertainty to bed'
- Polls suggest anything from big Tory majority to hung parliament

**Heather Stewart  
Rowena Mason**

Jeremy Corbyn urged Britain to "shock the establishment" and "vote for hope" last night, while Boris Johnson pleaded with voters to back him and settle the issue of Brexit before Christmas, at the conclusion of a bruising election campaign.

Both leaders stressed that the result could be very close as they toured marginal seats across the country with just 24 hours to go before polling stations opened this morning.

In his eve-of-poll message, Corbyn claimed the country stood at a "fork in the road" with a "truly historic" choice between parties with widely different values and policies.

"Tomorrow you can shock the establishment, by voting for hope," the Labour leader told a rally in Hoxton in east London. "Hope for yourself. Hope for your family. Hope for your community. Hope for our NHS. Hope for our country. Tomorrow, vote for hope. ... real change."

He said: "The establishment doesn't want Labour to win." Corbyn also hammered home the core message he has pushed throughout the campaign, that Johnson would "open our NHS to take-over by American mega corporations and carry on with more cuts", saying that was why the US president, Donald Trump, wanted the prime minister to hold on to power.

Johnson hosted his own rally not far away from his rival, in the Olympic Park in east London, making his message all about his determination



▲ The Labour leader, Jeremy Corbyn, in Dinnington, South Yorkshire, in the final hours of the campaign yesterday  
PHOTOGRAPH: CHRISTOPHER FURLONG/GETTY

**Full coverage**  
*Pages 4-5*

● Tories, Labour and Lib Dems in last push for votes *Pages 4-5*  
● Your guide to the night. And how it could play out *Pages 6-7*  
● Marina Hyde on Johnson's trip to the fridge *Page 8*  
● The EU nationals who will not get a say today *Pages 14-15*

to follow through on his Brexit promises. "Enough is enough," he said in remarks released in advance of the rally last night. "This election is our chance to end the gridlock, but the results are knife-edge."

He also urged constituents to claim that if the Conservatives failed to win a majority, Corbyn would have to seek a deal with the SNP, leading to second referendums on EU membership and Scottish independence.

"Today is our chance to unite as a country and put the uncertainty to bed so people can get on with their lives," the prime minister said.

"Just imagine how wonderful it will be to settle down to a turkey dinner this Christmas with Brexit decided

as a political opportunity. And Johnson was also criticised for his reaction to the case of a four-year-old boy pictured sleeping on the floor of a Leeds hospital - an image he appeared reluctant to let out when asked about it by a reporter on Monday.

Corbyn also toured the country yesterday, kicking off with an early-morning rally in Glasgow and taking in Middlesbrough, South Yorkshire and Bedford on his way back to the capital.

With the Liberal Democrats urging voters to back the party most likely to defeat the Conservatives and prevent a hard Brexit, and Nigel Farage's Brexit party threatening to split the leave vote in many of the traditionally Labour seats Johnson is



# Responsive Design

# Devices



# Responsive Design

The screenshot illustrates a responsive website layout for the University of Bristol Faculty of Engineering. The top navigation bar is shared across all devices and includes links for Home, Study at Bristol (with a dropdown menu), About, Schools & faculties, Research, Business & partnerships, News, and People. A search bar is also present in the top right. The main content area features a large green banner with the Faculty of Engineering logo and the text "Undergraduate studies in engineering". Below this, there are several sections: "Undergraduate courses" with a course search button, "Courses in departments" listing Aerospace Engineering, Civil Engineering, Computer Science, Electrical and Electronic Engineering, and Engineering Mathematics, and various other sections like "What subject to study?", "International students", and "Events". On the left, a sidebar provides links for Undergraduate, Postgraduate, People, Schools and Departments, Industrial Liaison Office, Research, Funding and scholarships, PhD opportunities, Facilities, Equality, diversity and inclusion, News, Events, Outreach, and Current students. The website uses a dark mode theme with a light background for most content areas.

Design principle 2:

**on the web, use responsive design**

# Design – the easy part



Evenly

Spaced

Rectangular

Grids

# NEWS

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## Woman arrested for murder after man dies

A man, in his 30s, was found critically injured at a tower block in Bristol on Thursday evening.

🕒 3h | Bristol



### Students in hotels due to accommodation delay

Freshers were told this week they face a three week delay to the building in Bristol.

🕒 6h | Bristol



### 'Out of practice' students urged to party safely

The council, universities and venues are working together to help make nights out safer after Covid.

🕒 9h | Bristol



### New consultation on controversial harbour scheme

The Mayor of Bristol asks residents about new plans to develop the Cumberland Basin area.

🕒 3h | Bristol



### Children of 90s study in biggest data collection

More than 20,000 participants will be invited to the Bristol Children of the 90s biggest ever clinic.

🕒 6h | Bristol



### Band's 1988 single re-released for exhibition

Massive Attack song Any Love features in a new album celebrating Bristol's music and street art.

🕒 10h | Bristol



### Two men found dead at house identified

A murder investigation is under way after the deaths of Denzil McKenzie and Fahad Hossain Pramanik.

🕒 21h | Bristol



### Bowling club lit up after £27k funding boost

🕒 23h | Bristol



### Black students urged to apply to internship scheme

🕒 2d | Bristol



### Alpaca owner accuses government of 'wall of silence'

🕒 1d | Bristol



### Safe drug rooms pilot idea knocked back

🕒 2d | Bristol

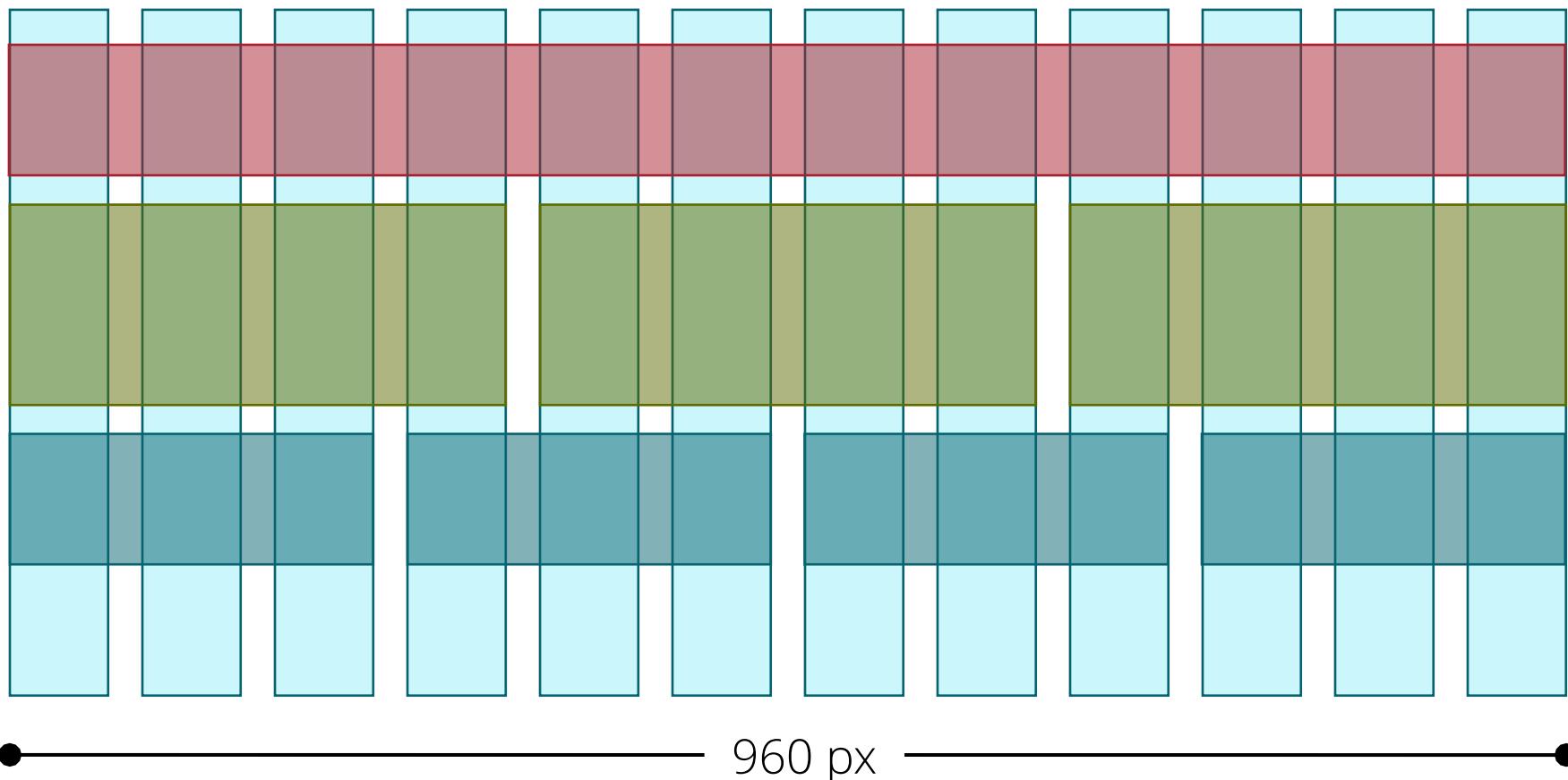


### Anglers banned from taking salmon catch home

🕒 21h | England



# 960.gs





[Download](#) - CSS, sketch paper, and templates for: Acorn, Fireworks, Flash, InDesign, GIMP, Inkscape, Illustrator, OmniGraffle, Photoshop, QuarkXPress, Visio, Exp Design. Repository at [GitHub](#).

# 960 GRID SYSTEM



Big ol' DOWNLOAD button :)



INTERVIEW ABOUT 960.gs

[VIEW SLIDES ABOUT THE 960 GRID SYSTEM](#)

[ADAPT.JS - ADAPTIVE CSS](#)

[CUSTOM CSS GENERATOR](#)

[GRID OVERLAY BOOKMARK](#)

## Essence

The 960 Grid System is an effort to streamline web development workflow by providing commonly used dimensions, based on a width of 960 pixels. There are two variants: 12 and 16 columns, which can be used separately or in tandem. [Read more](#).

## Dimensions

The 12-column grid is divided into portions that are 60 pixels wide. The 16-column grid consists of 40 pixel increments. Each column has 10 pixels of margin on the left and right, which create 20 pixel wide gutters between columns. [View demo](#).

## Purpose

The premise of the system is ideally suited to rapid prototyping, but it would work equally well when integrated into a production environment. There are printable sketch sheets, design layouts, and a CSS file that have identical measurements.

## More Columns

For those more comfortable designing on a 24-column grid, an alternative version is also included. It consists of columns 30 pixels wide, with 10 pixel gutters, and a 5 pixel buffer on each side of the container. This keeps text from touching browser chrome — helpful for devices like the iPhone, where a lower-case "I" or "l" might be easily missed. [View demo](#).

## Source Order

By utilizing the *push\_XX* and *pull\_XX* classes, elements can be rearranged, independent of the order in which they appear in the markup. This allows you to keep more pertinent info higher in the HTML, without sacrificing precision in your page layout. For instance, view the source code of this page to see how the *H1* tag has been re-positioned.



Design values

This is Ant Design's internal standard for evaluating design quality. Based on the assumption that "everyone is pursuing happiness at work", we have added the two values of "Meaningfulness" and "Growth" on the basis of "Certainty" and "Naturalness" to guide each designer towards better judgment and decision-making.

[More details >](#)



Certainty      Meaningfulness      Growth      Naturalness

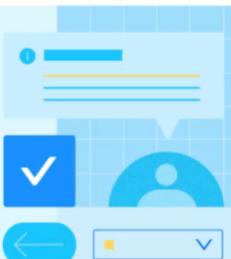
Guidelines

[Global style >](#)  
[Design patterns >](#)



Components

[Ant Design of React \(official\)](#)  
[Ant Design of Angular \(community\)](#)  
[Ant Design of Vue \(community\)](#)



AntV

A new way to do data visualization



Ant Design Pro

Out-of-the-box UI solution for enterprise applications



Ant Design Mobile

Mobile UI components with Ant Design

