# Simple Tables Demo Doc

## Contents

1	Data	2
2	wrap	2
3	Simple table	3
4	Annotate	4
5	Notes in minipage	5
6	Align	6
7	Units	7
8	Expand header rows	8
9	Math	9
10	hline from column	10
11	hline anywhere	11
12	Remove duplicate values	12
13	Add styling to data frame	13
14	Panel	14
15	Colspan	15
16	Colspan - multiple	16
17	Colspan - from cols	17
18	Handle wide columns  18.1 descr is taking over the table	18 18 18
19	Identify a summary row	19
20	Save the table to file	20
21	Long table	21
22	Fontsize	23
23	Row space	24
24	Col space	25

#### 1 Data

Mostly working with this data; but some others come in later to illustrate certain features.

```
library(pmtables)
library(yspec)
spec <- ys_help$spec()</pre>
pmdata <- readRDS("datasets/pmdata.RDS")</pre>
head(pmdata)
## # A tibble: 6 x 9
##
    STUDYf
                DOSEf FORMf WT
                                      CRCL AGE
                                                  N
                                                         ALB
                                                               SCR
     <chr>
                 <chr> <chr> <chr> <chr> <chr> <chr> <chr> <chr> <chr> <chr> <chr> <chr>
##
## 1 12-DEMO-001 100 mg tablet 71.4 104
                                            33.7 80
                                                        4.20 1.06
## 2 12-DEMO-001 150 mg capsule 89.4 122
                                            24.4 16
                                                        4.63 1.12
## 3 12-DEMO-001 150 mg tablet 81.7 104
                                            34.4 48
                                                        3.83 0.910
## 4 12-DEMO-001 150 mg troche 94.0 93.2 27.4 16
                                                        4.94 1.25
## 5 12-DEMO-001 200 mg tablet 67.9 100
                                            27.5 64
                                                        4.25 1.10
## 6 12-DEMO-001 200 mg troche 76.6 99.2 22.8 16
                                                        4.54 1.15
data <- select(pmdata, STUDY = STUDYf, DOSE = DOSEf, WT, AGE, CRCL, ALB, SCR)
```

#### 2 wrap

There is a wrap function in this document. Don't worry about that; it just puts the output into a table environment and sends the output to get rendered in markdown.

## 3 Simple table

data %>% stable(col\_bold=TRUE) %>% pt\_wrap(stdout())

STUDY	DOSE	WT	AGE	CRCL	ALB	SCR
12-DEMO-001	100 mg	71.4	33.7	104	4.20	1.06
12-DEMO-001	150 mg	89.4	24.4	122	4.63	1.12
12-DEMO-001	150 mg	81.7	34.4	104	3.83	0.910
12-DEMO-001	150 mg	94.0	27.4	93.2	4.94	1.25
12-DEMO-001	200 mg	67.9	27.5	100	4.25	1.10
12-DEMO-001	200 mg	76.6	22.8	99.2	4.54	1.15
12-DEMO-002	100 mg	61.3	38.3	113	4.04	1.28
12-DEMO-002	100 mg	77.6	29.9	106	4.31	0.981
12-DEMO-002	50 mg	74.1	37.1	112	4.44	0.900
12-DEMO-002	50 mg	71.2	34.1	106	4.63	0.868
12-DEMO-002	75 mg	72.4	38.2	105	3.89	0.900
12-DEMO-002	75 mg	71.6	34.2	98.9	4.49	0.991
12-DEMO-002	75 mg	73.6	49.2	103	4.52	0.930

#### 4 Annotate

- Arguments to identify the name of the generating R script and the output file name
- The output file name is retained as an attribute to be used later when saving the table data
- Arbitrary notes are also allowed (encouraged)

```
stable(
  data,
  r_file = "foo.R",
  output_file = "foo.tex",
  notes = c("Data were analyzed in quadruplicate.", "The results are very clear."),
) %>% pt_wrap(stdout())
```

STUDY	DOSE	WT	AGE	CRCL	ALB	SCR
12-DEMO-001	100 mg	71.4	33.7	104	4.20	1.06
12-DEMO-001	150 mg	89.4	24.4	122	4.63	1.12
12-DEMO-001	150 mg	81.7	34.4	104	3.83	0.910
12-DEMO-001	150 mg	94.0	27.4	93.2	4.94	1.25
12-DEMO-001	200 mg	67.9	27.5	100	4.25	1.10
12-DEMO-001	200 mg	76.6	22.8	99.2	4.54	1.15
12-DEMO-002	100 mg	61.3	38.3	113	4.04	1.28
12-DEMO-002	100 mg	77.6	29.9	106	4.31	0.981
12-DEMO-002	50 mg	74.1	37.1	112	4.44	0.900
12-DEMO-002	50 mg	71.2	34.1	106	4.63	0.868
12-DEMO-002	75 mg	72.4	38.2	105	3.89	0.900
12-DEMO-002	75 mg	71.6	34.2	98.9	4.49	0.991
12-DEMO-002	75 mg	73.6	49.2	103	4.52	0.930

Data were analyzed in quadruplicate.

The results are very clear.

Source code: foo.R Source file: foo.tex

### 5 Notes in minipage

- By default, notes are put in the 3rd part of threeparttable
- Alternatively, we can put them in a minipage just below the table

```
stable(
  data,
  note_config = noteconf(type = "minipage", width = 0.65),
  notes = c("Data were analyzed in quadruplicate.", "The results are very clear."),
) %>% pt_wrap(stdout())
```

STUDY         DOSE         WT         AGE         CRCL         ALB         SCR           12-DEMO-001         100 mg         71.4         33.7         104         4.20         1.06           12-DEMO-001         150 mg         89.4         24.4         122         4.63         1.12           12-DEMO-001         150 mg         81.7         34.4         104         3.83         0.910           12-DEMO-001         150 mg         94.0         27.4         93.2         4.94         1.25           12-DEMO-001         200 mg         67.9         27.5         100         4.25         1.10           12-DEMO-001         200 mg         76.6         22.8         99.2         4.54         1.15           12-DEMO-002         100 mg         76.6         22.8         99.2         4.54         1.15           12-DEMO-002         100 mg         77.6         29.9         106         4.31         0.981           12-DEMO-002         50 mg         74.1         37.1         112         4.44         0.900           12-DEMO-002         75 mg         72.4         38.2         105         3.89         0.900           12-DEMO-002         75 mg							
12-DEMO-001       150 mg       89.4       24.4       122       4.63       1.12         12-DEMO-001       150 mg       81.7       34.4       104       3.83       0.910         12-DEMO-001       150 mg       94.0       27.4       93.2       4.94       1.25         12-DEMO-001       200 mg       67.9       27.5       100       4.25       1.10         12-DEMO-001       200 mg       76.6       22.8       99.2       4.54       1.15         12-DEMO-002       100 mg       61.3       38.3       113       4.04       1.28         12-DEMO-002       100 mg       77.6       29.9       106       4.31       0.981         12-DEMO-002       50 mg       74.1       37.1       112       4.44       0.900         12-DEMO-002       50 mg       71.2       34.1       106       4.63       0.868         12-DEMO-002       75 mg       72.4       38.2       105       3.89       0.900         12-DEMO-002       75 mg       71.6       34.2       98.9       4.49       0.991	STUDY	DOSE	WT	AGE	CRCL	ALB	SCR
12-DEMO-001       150 mg       81.7       34.4       104       3.83       0.910         12-DEMO-001       150 mg       94.0       27.4       93.2       4.94       1.25         12-DEMO-001       200 mg       67.9       27.5       100       4.25       1.10         12-DEMO-001       200 mg       76.6       22.8       99.2       4.54       1.15         12-DEMO-002       100 mg       61.3       38.3       113       4.04       1.28         12-DEMO-002       100 mg       77.6       29.9       106       4.31       0.981         12-DEMO-002       50 mg       74.1       37.1       112       4.44       0.900         12-DEMO-002       50 mg       71.2       34.1       106       4.63       0.868         12-DEMO-002       75 mg       72.4       38.2       105       3.89       0.900         12-DEMO-002       75 mg       71.6       34.2       98.9       4.49       0.991	12-DEMO-001	100 mg	71.4	33.7	104	4.20	1.06
12-DEMO-001       150 mg       94.0       27.4       93.2       4.94       1.25         12-DEMO-001       200 mg       67.9       27.5       100       4.25       1.10         12-DEMO-001       200 mg       76.6       22.8       99.2       4.54       1.15         12-DEMO-002       100 mg       61.3       38.3       113       4.04       1.28         12-DEMO-002       100 mg       77.6       29.9       106       4.31       0.981         12-DEMO-002       50 mg       74.1       37.1       112       4.44       0.900         12-DEMO-002       50 mg       71.2       34.1       106       4.63       0.868         12-DEMO-002       75 mg       72.4       38.2       105       3.89       0.900         12-DEMO-002       75 mg       71.6       34.2       98.9       4.49       0.991	12-DEMO-001	150 mg	89.4	24.4	122	4.63	1.12
12-DEMO-001       200 mg       67.9       27.5       100       4.25       1.10         12-DEMO-001       200 mg       76.6       22.8       99.2       4.54       1.15         12-DEMO-002       100 mg       61.3       38.3       113       4.04       1.28         12-DEMO-002       100 mg       77.6       29.9       106       4.31       0.981         12-DEMO-002       50 mg       74.1       37.1       112       4.44       0.900         12-DEMO-002       50 mg       71.2       34.1       106       4.63       0.868         12-DEMO-002       75 mg       72.4       38.2       105       3.89       0.900         12-DEMO-002       75 mg       71.6       34.2       98.9       4.49       0.991	12-DEMO-001	150 mg	81.7	34.4	104	3.83	0.910
12-DEMO-001       200 mg       76.6       22.8       99.2       4.54       1.15         12-DEMO-002       100 mg       61.3       38.3       113       4.04       1.28         12-DEMO-002       100 mg       77.6       29.9       106       4.31       0.981         12-DEMO-002       50 mg       74.1       37.1       112       4.44       0.900         12-DEMO-002       50 mg       71.2       34.1       106       4.63       0.868         12-DEMO-002       75 mg       72.4       38.2       105       3.89       0.900         12-DEMO-002       75 mg       71.6       34.2       98.9       4.49       0.991	12-DEMO-001	150 mg	94.0	27.4	93.2	4.94	1.25
12-DEMO-002       100 mg       61.3       38.3       113       4.04       1.28         12-DEMO-002       100 mg       77.6       29.9       106       4.31       0.981         12-DEMO-002       50 mg       74.1       37.1       112       4.44       0.900         12-DEMO-002       50 mg       71.2       34.1       106       4.63       0.868         12-DEMO-002       75 mg       72.4       38.2       105       3.89       0.900         12-DEMO-002       75 mg       71.6       34.2       98.9       4.49       0.991	12-DEMO-001	200 mg	67.9	27.5	100	4.25	1.10
12-DEMO-002       100 mg       77.6       29.9       106       4.31       0.981         12-DEMO-002       50 mg       74.1       37.1       112       4.44       0.900         12-DEMO-002       50 mg       71.2       34.1       106       4.63       0.868         12-DEMO-002       75 mg       72.4       38.2       105       3.89       0.900         12-DEMO-002       75 mg       71.6       34.2       98.9       4.49       0.991	12-DEMO-001	200 mg	76.6	22.8	99.2	4.54	1.15
12-DEMO-002       50 mg       74.1       37.1       112       4.44       0.900         12-DEMO-002       50 mg       71.2       34.1       106       4.63       0.868         12-DEMO-002       75 mg       72.4       38.2       105       3.89       0.900         12-DEMO-002       75 mg       71.6       34.2       98.9       4.49       0.991	12-DEMO-002	100 mg	61.3	38.3	113	4.04	1.28
12-DEMO-002 50 mg 71.2 34.1 106 4.63 0.868 12-DEMO-002 75 mg 72.4 38.2 105 3.89 0.900 12-DEMO-002 75 mg 71.6 34.2 98.9 4.49 0.991	12-DEMO-002	100 mg	77.6	29.9	106	4.31	0.981
12-DEMO-002 75 mg 72.4 38.2 105 3.89 0.900 12-DEMO-002 75 mg 71.6 34.2 98.9 4.49 0.991	12-DEMO-002	50 mg	74.1	37.1	112	4.44	0.900
12-DEMO-002 75 mg 71.6 34.2 98.9 4.49 0.991	12-DEMO-002	50 mg	71.2	34.1	106	4.63	0.868
	12-DEMO-002	75 mg	72.4	38.2	105	3.89	0.900
12-DEMO-002 75 mg 73.6 49.2 103 4.52 0.930	12-DEMO-002	75 mg	71.6	34.2	98.9	4.49	0.991
	12-DEMO-002	75 mg	73.6	49.2	103	4.52	0.930

Data were analyzed in quadruplicate.

The results are very clear.

## 6 Align

- Center everything except for
   STUDY (left)
   DOSE and SCR (right)

```
stable(align = cols_center(STUDY = '1', .r = "DOSE,SCR")) %>%
pt_wrap(stdout())
```

STUDY	DOSE	WT	AGE	CRCL	ALB	SCR
12-DEMO-001	100 mg	71.4	33.7	104	4.20	1.06
12-DEMO-001	150 mg	89.4	24.4	122	4.63	1.12
12-DEMO-001	150 mg	81.7	34.4	104	3.83	0.910
12-DEMO-001	150 mg	94.0	27.4	93.2	4.94	1.25
12-DEMO-001	200 mg	67.9	27.5	100	4.25	1.10
12-DEMO-001	200 mg	76.6	22.8	99.2	4.54	1.15
12-DEMO-002	100 mg	61.3	38.3	113	4.04	1.28
12-DEMO-002	100 mg	77.6	29.9	106	4.31	0.981
12-DEMO-002	50 mg	74.1	37.1	112	4.44	0.900
12-DEMO-002	50 mg	71.2	34.1	106	4.63	0.868
12-DEMO-002	75 mg	72.4	38.2	105	3.89	0.900
12-DEMO-002	75 mg	71.6	34.2	98.9	4.49	0.991
12-DEMO-002	75 mg	73.6	49.2	103	4.52	0.930

### 7 Units

• Automatically put units under the column name

```
units <- ys_get_unit(spec, parens = TRUE)
stable(
  data,
  units = units,
) %>% pt_wrap(stdout())
```

STUDY	DOSE	WT (kg)	AGE (years)	CRCL (ml/min)	ALB (g/dL)	SCR (mg/dL)
12-DEMO-001	100 mg	71.4	33.7	104	4.20	1.06
12-DEMO-001	150 mg	89.4	24.4	122	4.63	1.12
12-DEMO-001	150 mg	81.7	34.4	104	3.83	0.910
12-DEMO-001	150 mg	94.0	27.4	93.2	4.94	1.25
12-DEMO-001	200 mg	67.9	27.5	100	4.25	1.10
12-DEMO-001	200 mg	76.6	22.8	99.2	4.54	1.15
12-DEMO-002	100 mg	61.3	38.3	113	4.04	1.28
12-DEMO-002	100 mg	77.6	29.9	106	4.31	0.981
12-DEMO-002	50 mg	74.1	37.1	112	4.44	0.900
12-DEMO-002	50 mg	71.2	34.1	106	4.63	0.868
12-DEMO-002	75 mg	72.4	38.2	105	3.89	0.900
12-DEMO-002	75 mg	71.6	34.2	98.9	4.49	0.991
12-DEMO-002	75 mg	73.6	49.2	103	4.52	0.930

## 8 Expand header rows

- Multiline table header
- Unlimited number
- Use . . . to break

```
stable(
  data,
  col_rename = vars("Study...Number" = STUDY, "Serum...Albumin" = ALB),
  units = units
) %>% pt_wrap(stdout())
```

Study Number	DOSE	WT (kg)	AGE (years)	CRCL (ml/min)	Serum Albumin (g/dL)	SCR (mg/dL)
12-DEMO-001	100 mg	71.4	33.7	104	4.20	1.06
12-DEMO-001	150 mg	89.4	24.4	122	4.63	1.12
12-DEMO-001	150 mg	81.7	34.4	104	3.83	0.910
12-DEMO-001	150 mg	94.0	27.4	93.2	4.94	1.25
12-DEMO-001	200 mg	67.9	27.5	100	4.25	1.10
12-DEMO-001	200 mg	76.6	22.8	99.2	4.54	1.15
12-DEMO-002	100 mg	61.3	38.3	113	4.04	1.28
12-DEMO-002	100 mg	77.6	29.9	106	4.31	0.981
12-DEMO-002	50 mg	74.1	37.1	112	4.44	0.900
12-DEMO-002	50 mg	71.2	34.1	106	4.63	0.868
12-DEMO-002	75 mg	72.4	38.2	105	3.89	0.900
12-DEMO-002	75 mg	71.6	34.2	98.9	4.49	0.991
12-DEMO-002	75 mg	73.6	49.2	103	4.52	0.930

#### 9 Math

- Columns with at least two \$ are "math" and will not be sanitized
- Otherwise the are functions to "prime" the data frame
  - The default is to convert every column to character
  - Then walk the columns, look for non-math columns and sanitize them

```
ptab <- readRDS("datasets/ptab.RDS")</pre>
ptab
## # A tibble: 4 x 6
##
                                             Symbol
                                                                                    SE
     .type
                        Parameter
                                                       Math
                                                                       Estimate
##
     <chr>>
                         <chr>
                                             <chr>
                                                       <chr>
                                                                           <dbl> <dbl>
                                             CL (L/h~ "\\exp(\\thet~
## 1 Fixed-effects
                         Clearance
                                                                           1.22 0.4
## 2 Fixed-effects
                         Volume of distribu~ V2 (L)
                                                       "$\leq(\t \cdot )
                                                                           5.87 0.89
## 3 Fixed-effects
                        Absorption rate co~ KA (1/h~ "\ \\theta_3$"
                                                                           1.23 0.1
## 4 Unexplained varia~ Additive_error
                                             RUV
                                                       "$\\sigma_1$"
                                                                           0.02 0.01
stable(
  ptab,
  align = cols_center(Parameter = col_ragged(3), .1 = "Symbol"),
  panel = ".type"
  ) %>% pt_wrap(stdout())
```

Parameter	Symbol	Math	Estimate	SE				
Fixed-effects								
Clearance	CL (L/hr)	$\exp(\theta_1)$	1.22	0.4				
Volume of distribution	V2 (L)	$\exp(\theta_2)$	5.87	0.89				
Absorption rate constant	KA (1/hr)	$ heta_3$	1.23	0.1				
Unexplained variability								
Additive_error	RUV	$\sigma_1$	0.02	0.01				

### 10 hline from column

• Use the column to determine where the hline should go

```
stable(
  data,
  hline_from = "STUDY",
) %>% pt_wrap(stdout())
```

STUDY	DOSE	WT	AGE	CRCL	ALB	SCR
12-DEMO-001	100 mg	71.4	33.7	104	4.20	1.06
12-DEMO-001	150 mg	89.4	24.4	122	4.63	1.12
12-DEMO-001	150 mg	81.7	34.4	104	3.83	0.910
12-DEMO-001	150 mg	94.0	27.4	93.2	4.94	1.25
12-DEMO-001	200 mg	67.9	27.5	100	4.25	1.10
12-DEMO-001	200 mg	76.6	22.8	99.2	4.54	1.15
12-DEMO-002	100 mg	61.3	38.3	113	4.04	1.28
12-DEMO-002	100 mg	77.6	29.9	106	4.31	0.981
12-DEMO-002	50 mg	74.1	37.1	112	4.44	0.900
12-DEMO-002	50 mg	71.2	34.1	106	4.63	0.868
12-DEMO-002	75 mg	72.4	38.2	105	3.89	0.900
12-DEMO-002	75 mg	71.6	34.2	98.9	4.49	0.991
12-DEMO-002	75 mg	73.6	49.2	103	4.52	0.930

## 11 hline anywhere

• Give row numbers for hline

```
stable(
  data,
  hline_at = c(3,nrow(data))-1,
) %>% pt_wrap(stdout())
```

STUDY	DOSE	WT	AGE	CRCL	ALB	SCR
12-DEMO-001	100 mg	71.4	33.7	104	4.20	1.06
12-DEMO-001	150 mg	89.4	24.4	122	4.63	1.12
12-DEMO-001	150 mg	81.7	34.4	104	3.83	0.910
12-DEMO-001	150 mg	94.0	27.4	93.2	4.94	1.25
12-DEMO-001	200 mg	67.9	27.5	100	4.25	1.10
12-DEMO-001	200 mg	76.6	22.8	99.2	4.54	1.15
12-DEMO-002	100 mg	61.3	38.3	113	4.04	1.28
12-DEMO-002	100 mg	77.6	29.9	106	4.31	0.981
12-DEMO-002	50 mg	74.1	37.1	112	4.44	0.900
12-DEMO-002	50 mg	71.2	34.1	106	4.63	0.868
12-DEMO-002	75 mg	72.4	38.2	105	3.89	0.900
12-DEMO-002	75 mg	71.6	34.2	98.9	4.49	0.991
12-DEMO-002	75 mg	73.6	49.2	103	4.52	0.930

## 12 Remove duplicate values

• Discard repeating values in a column

```
stable(
  data,
  clear_reps = "STUDY",
) %>% pt_wrap(stdout())
```

STUDY	DOSE	WT	AGE	CRCL	ALB	SCR
12-DEMO-001	100 mg	71.4	33.7	104	4.20	1.06
	150 mg	89.4	24.4	122	4.63	1.12
	150 mg	81.7	34.4	104	3.83	0.910
	150 mg	94.0	27.4	93.2	4.94	1.25
	200 mg	67.9	27.5	100	4.25	1.10
	200 mg	76.6	22.8	99.2	4.54	1.15
12-DEMO-002	100 mg	61.3	38.3	113	4.04	1.28
	100 mg	77.6	29.9	106	4.31	0.981
	50 mg	74.1	37.1	112	4.44	0.900
	50 mg	71.2	34.1	106	4.63	0.868
	75 mg	72.4	38.2	105	3.89	0.900
	75 mg	71.6	34.2	98.9	4.49	0.991
	75 mg	73.6	49.2	103	4.52	0.930

### 13 Add styling to data frame

- tex\_bold will make table cells bold when they match pattern
- $\bullet$  tex\_it will make table cells italics when they match pattern
- styling is only added when there is at least one character
- input must be string
- combine this with clear\_rep and hline\_from to partition the table

```
tmp <- ptdata() %>% rename(STUDY = STUDYf, SEX = SEXf)

tmp <- mutate(tmp, STUDY = tex_bold(as.character(STUDY)))

stable(
   tmp,
   clear_reps = "STUDY",
   hline_from = "STUDY",
) %>% pt_wrap(stdout())
```

STUDY	SEX	WT	SCR	ALB	N
12-DEMO-001	male	76.3	1.09	4.33	10
	female	70.0	1.01	4.25	20
12-DEMO-002	male	71.9	1.01	4.57	18
	female	72.6	0.949	4.42	32
11-DEMO-005	male	69.2	2.51	4.46	29
	female	67.9	2.53	4.26	11
13-DEMO-001	male	71.1	0.922	3.68	23
	female	67.0	0.988	3.45	17

### 14 Panel

- Divide the table using column contentsthere's a bug somewhere there

```
stable(
  data,
panel = as.panel("STUDY", prefix = "Study number: "),
) %>% pt_wrap(stdout())
```

DOSE	WT	AGE	CRCL	ALB	SCR					
Study number: 12-DEMO-001										
100 mg	71.4	33.7	104	4.20	1.06					
150 mg	89.4	24.4	122	4.63	1.12					
150 mg	81.7	34.4	104	3.83	0.910					
150 mg	94.0	27.4	93.2	4.94	1.25					
200 mg	67.9	27.5	100	4.25	1.10					
200 mg	76.6	22.8	99.2	4.54	1.15					
Study ni	ımber	: 12-D	EMO-00	2						
100 mg	61.3	38.3	113	4.04	1.28					
100 mg	77.6	29.9	106	4.31	0.981					
50 mg	74.1	37.1	112	4.44	0.900					
50 mg	71.2	34.1	106	4.63	0.868					
75 mg	72.4	38.2	105	3.89	0.900					
75 mg	71.6	34.2	98.9	4.49	0.991					
75 mg	73.6	49.2	103	4.52	0.930					

## 15 Colspan

• Group columns

```
stable(
  data,
  span = colgroup("In final model", WT:CRCL),
) %>% pt_wrap(stdout())
```

		In				
STUDY	DOSE	WT	AGE	CRCL	ALB	SCR
12-DEMO-001	100 mg	71.4	33.7	104	4.20	1.06
12-DEMO-001	150 mg	89.4	24.4	122	4.63	1.12
12-DEMO-001	150 mg	81.7	34.4	104	3.83	0.910
12-DEMO-001	150 mg	94.0	27.4	93.2	4.94	1.25
12-DEMO-001	200 mg	67.9	27.5	100	4.25	1.10
12-DEMO-001	200 mg	76.6	22.8	99.2	4.54	1.15
12-DEMO-002	100 mg	61.3	38.3	113	4.04	1.28
12-DEMO-002	100 mg	77.6	29.9	106	4.31	0.981
12-DEMO-002	50 mg	74.1	37.1	112	4.44	0.900
12-DEMO-002	50 mg	71.2	34.1	106	4.63	0.868
12-DEMO-002	75 mg	72.4	38.2	105	3.89	0.900
12-DEMO-002	75 mg	71.6	34.2	98.9	4.49	0.991
12-DEMO-002	75 mg	73.6	49.2	103	4.52	0.930

## 16 Colspan - multiple

- Multiple groupings
- Multiple levels

```
stable(
  data,
  span = list(
    colgroup("Meh", DOSE:WT),
    colgroup("Hrm", AGE:CRCL),
    colgroup("Huh", ALB:SCR),
    colgroup("Expert opinion", CRCL:SCR, level = 2)
)
) %>% pt_wrap(stdout())
```

		Expert opinio				
	Mel	Meh		Hrm		uh
STUDY	DOSE	WT	AGE	CRCL	ALB	SCR
12-DEMO-001	100 mg	71.4	33.7	104	4.20	1.06
12-DEMO-001	150 mg	89.4	24.4	122	4.63	1.12
12-DEMO-001	150 mg	81.7	34.4	104	3.83	0.910
12-DEMO-001	150 mg	94.0	27.4	93.2	4.94	1.25
12-DEMO-001	200 mg	67.9	27.5	100	4.25	1.10
12-DEMO-001	200 mg	76.6	22.8	99.2	4.54	1.15
12-DEMO-002	100 mg	61.3	38.3	113	4.04	1.28
12-DEMO-002	100 mg	77.6	29.9	106	4.31	0.981
12-DEMO-002	50 mg	74.1	37.1	112	4.44	0.900
12-DEMO-002	50 mg	71.2	34.1	106	4.63	0.868
12-DEMO-002	75 mg	72.4	38.2	105	3.89	0.900
12-DEMO-002	75 mg	71.6	34.2	98.9	4.49	0.991
12-DEMO-002	75 mg	73.6	49.2	103	4.52	0.930

### 17 Colspan - from cols

• we have some columns of the form tag.name

```
dotdata <- readRDS("datasets/with-dots.RDS")</pre>
head(dotdata, n=2)
## # A tibble: 2 x 7
   STUDY
           Normal.WT Normal.CRCL Normal.ALB ESRD.WT ESRD.CRCL ESRD.ALB
##
     <chr>
                <chr>
                          <chr>
                                      <chr>
                                                  <chr>
                                                          <chr>
                                                                    <chr>>
## 1 12-DEMO-001 71.4
                                      4.20
                                                 78.5
                          104
                                                          26.0
                                                                   2.10
## 2 12-DEMO-001 81.7
                          104
                                      3.83
                                                  89.9
                                                          26.1
                                                                   1.92
stable(
 dotdata,
  span_split = colsplit(sep = '.'),
) %>% pt_wrap(stdout())
```

		Normal			ESRD	
STUDY	WT	CRCL	ALB	WT	CRCL	ALB
12-DEMO-001	71.4	104	4.20	78.5	26.0	2.10
12-DEMO-001	81.7	104	3.83	89.9	26.1	1.92
12-DEMO-001	89.4	122	4.63	98.4	30.6	2.32
12-DEMO-001	94.0	93.2	4.94	103	23.3	2.47
12-DEMO-001	67.9	100	4.25	74.7	25.1	2.13
12-DEMO-001	76.6	99.2	4.54	84.2	24.8	2.27
12-DEMO-002	77.6	106	4.31	85.4	26.4	2.16
12-DEMO-002	61.3	113	4.04	67.4	28.2	2.02
12-DEMO-002	71.2	106	4.63	78.3	26.4	2.32
12-DEMO-002	74.1	112	4.44	81.5	28.0	2.22
12-DEMO-002	71.6	98.9	4.49	78.8	24.7	2.25
12-DEMO-002	72.4	105	3.89	79.6	26.3	1.94
12-DEMO-002	73.6	103	4.52	81.0	25.8	2.26

#### 18 Handle wide columns

#### 18.1 descr is taking over the table

```
ptable <- readRDS("datasets/ptable.RDS")
stable(ptable) %>% pt_wrap(stdout())
```

symbol	descr	estimate	standard.error
CL (L)	Metabolic clearance in adults who graduated high school before 1973 and live in Muncie.	100	200

#### 18.2 Limit descr to 5 cm

```
stable(
  ptable,
  align = cols_center(descr = col_ragged(5))
) %>% pt_wrap(stdout())
```

symbol	descr	estimate	standard.error	rse
CL (L)	Metabolic clearance in adults who graduated high school before 1973 and live in Muncie.	100	200	2

### 19 Identify a summary row

We can point to one or more rows and style it up as a "summary row"

STUDY	WT	AGE	CRCL	ALB	SCR
12-DEMO-001	80.2	28.4	104	4.40	1.10
12-DEMO-002	71.7	37.3	106	4.33	0.979
All Studies	75.9	32.8	105	4.37	1.04

#### 20 Save the table to file

• There is a output file attribute on the text that is returned

```
tab <- stable(data, output_file = "foo.tex")
str(tab)

## 'stable' chr [1:26] "{\\def\\arraystretch{1.4}\\tabcolsep=5pt" ...
## - attr(*, "stable_file")= chr "foo.tex"

This can be used to save
stable_save(tab)

file.exists("foo.tex")

## [1] TRUE</pre>
```

#### 21 Long table

```
long <- ptdata()
long <- map_dfr(1:5, ~ long) %>% arrange(STUDYf,SEXf)

long %>%
  stable_long(
   panel = "STUDYf", col_bold = TRUE,
    units = ys_get_unit(spec, parens = TRUE),
   notes = "The results look great!",
   col_rename = c("Sex" = "SEXf", "Study" = "STUDYf"),
   r_file = "foo.R", output_file = "../deliv/table/output.tex",
   note_config = noteconf(type = "minipage", width = 0.5, table_skip = 0.2)
  ) %>% as.character() %>% writeLines
```

Table 1:

	TATE	CCD	ATD	
Sex	WT (kg)	<b>SCR</b> (mg/dL)	<b>ALB</b> (g/dL)	N
12-DEM	<b>IO-001</b>			
male	76.3	1.09	4.33	10
male	76.3	1.09	4.33	10
male	76.3	1.09	4.33	10
male	76.3	1.09	4.33	10
male	76.3	1.09	4.33	10
female	70.0	1.01	4.25	20
female	70.0	1.01	4.25	20
female	70.0	1.01	4.25	20
female	70.0	1.01	4.25	20
female	70.0	1.01	4.25	20
12-DEM	O-002			
male	71.9	1.01	4.57	18
male	71.9	1.01	4.57	18
male	71.9	1.01	4.57	18
male	71.9	1.01	4.57	18
male	71.9	1.01	4.57	18
female	72.6	0.949	4.42	32
female	72.6	0.949	4.42	32
female	72.6	0.949	4.42	32
female	72.6	0.949	4.42	32
female	72.6	0.949	4.42	32
11-DEM	O-005			
male	69.2	2.51	4.46	29
male	69.2	2.51	4.46	29
male	69.2	2.51	4.46	29

continued on next page

Sex	WT (kg)	SCR (mg/dL)	<b>ALB</b> (g/dL)	N
male	69.2	2.51	4.46	29
male	69.2	2.51	4.46	29
female	67.9	2.53	4.26	11
female	67.9	2.53	4.26	11
female	67.9	2.53	4.26	11
female	67.9	2.53	4.26	11
female	67.9	2.53	4.26	11
13-DEM	O-001			
male	71.1	0.922	3.68	23
male	71.1	0.922	3.68	23
male	71.1	0.922	3.68	23
male	71.1	0.922	3.68	23
male	71.1	0.922	3.68	23
female	67.0	0.988	3.45	17
female	67.0	0.988	3.45	17
female	67.0	0.988	3.45	17
female	67.0	0.988	3.45	17
female	67.0	0.988	3.45	17

The results look great! Source code: foo.R

}

Source file: ../deliv/table/output.tex

22

#### 22 Fontsize

• Where's my glasses?

```
data %>% stable(sizes = tab_size(font = "tiny")) %>% pt_wrap(stdout())
```

STUDY	DOSE	WT	AGE	CRCL	ALB	SCR
12-DEMO-001	100 mg	71.4	33.7	104	4.20	1.06
12-DEMO-001	150 mg	89.4	24.4	122	4.63	1.12
12-DEMO-001	150 mg	81.7	34.4	104	3.83	0.910
12-DEMO-001	150 mg	94.0	27.4	93.2	4.94	1.25
12-DEMO-001	200 mg	67.9	27.5	100	4.25	1.10
12-DEMO-001	200 mg	76.6	22.8	99.2	4.54	1.15
12-DEMO-002	100 mg	61.3	38.3	113	4.04	1.28
12-DEMO-002	100 mg	77.6	29.9	106	4.31	0.981
12-DEMO-002	50 mg	74.1	37.1	112	4.44	0.900
12-DEMO-002	50 mg	71.2	34.1	106	4.63	0.868
12-DEMO-002	75 mg	72.4	38.2	105	3.89	0.900
12-DEMO-002	75 mg	71.6	34.2	98.9	4.49	0.991
12-DEMO-002	75 mg	73.6	49.2	103	4.52	0.930

### 23 Row space

```
data %>% slice(1:3) %>% stable() %>% pt_wrap(stdout())
```

STUDY	DOSE	WT	AGE	CRCL	ALB	SCR
12-DEMO-001	100 mg	71.4	33.7	104	4.20	1.06
12-DEMO-001	150 mg	89.4	24.4	122	4.63	1.12
12-DEMO-001	150 mg	81.7	34.4	104	3.83	0.910

```
data %>% slice(1:3) %>% stable(sizes = tab_size(row = 0.9)) %>% pt_wrap(stdout())
```

STUDY	DOSE	WT	AGE	CRCL	ALB	SCR
12-DEMO-001	100 mg	71.4	33.7	104	4.20	1.06
12-DEMO-001	150 mg	89.4	24.4	122	4.63	1.12
12-DEMO-001	150 mg	81.7	34.4	104	3.83	0.910

STUDY	DOSE	WT	AGE	CRCL	ALB	SCR
12-DEMO-001	100 mg	71.4	33.7	104	4.20	1.06
12-DEMO-001	150 mg	89.4	24.4	122	4.63	1.12
12-DEMO-001	150 mg	81.7	34.4	104	3.83	0.910

## 24 Col space

data %>% stable(sizes = tab\_size(col = 20)) %>% pt\_wrap(stdout())

STUDY	DOSE	WT	AGE	CRCL	ALB	SCR
12-DEMO-001	100 mg	71.4	33.7	104	4.20	1.06
12-DEMO-001	150 mg	89.4	24.4	122	4.63	1.12
12-DEMO-001	150 mg	81.7	34.4	104	3.83	0.910
12-DEMO-001	150 mg	94.0	27.4	93.2	4.94	1.25
12-DEMO-001	200 mg	67.9	27.5	100	4.25	1.10
12-DEMO-001	200 mg	76.6	22.8	99.2	4.54	1.15
12-DEMO-002	100 mg	61.3	38.3	113	4.04	1.28
12-DEMO-002	100 mg	77.6	29.9	106	4.31	0.981
12-DEMO-002	50 mg	74.1	37.1	112	4.44	0.900
12-DEMO-002	50 mg	71.2	34.1	106	4.63	0.868
12-DEMO-002	75 mg	72.4	38.2	105	3.89	0.900
12-DEMO-002	75 mg	71.6	34.2	98.9	4.49	0.991
12-DEMO-002	75 mg	73.6	49.2	103	4.52	0.930