# CT-Pop Cell Type Stacked Bar Graphs Notebook

# Contents

1	Environment	1
2	Load Data	2
3	Prepare data	2
4	Creating labels for bar plots	4
5	Pivot table	4
6	Ranking dataset cell types by organ and tool	4
7	Stacked Bar Graphs	4
	7.1 Heart Datasets	4
	7.2 Respiratory System Datasets	5
	7.3 Liver Datasets	5
	7.4 Lactiferous Glands In Breast Datasets	6
	7.5 Kidney Datasets	7
	7.6 Large Intestine Datasets	8
	7.7 Small Intestine Datasets	8
	7.8 Skin Datasets	9
	7.9 Spleen Datasets	9
	7.10 Ureter Datasets	9

## 1 Environment

```
library(tidyr)
library(plyr)
library(dplyr)
library(magrittr)
library(ggplot2)
library(stringr)
options(scipen = 999)
knitr::opts_chunk$set(
   echo = FALSE,
   message = FALSE,
    warning = FALSE,
    fig.align='center',
    fig.pos='H',
    fig.path = "../output/barplots/",
    dev = c("pdf"),
    dpi=500
```

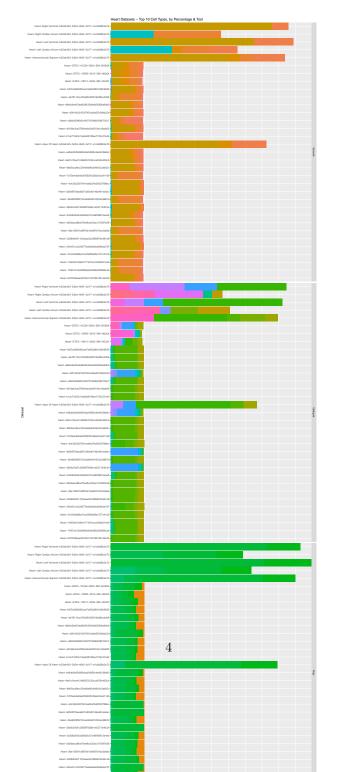
#### 2 Load Data

#### 3 Prepare data

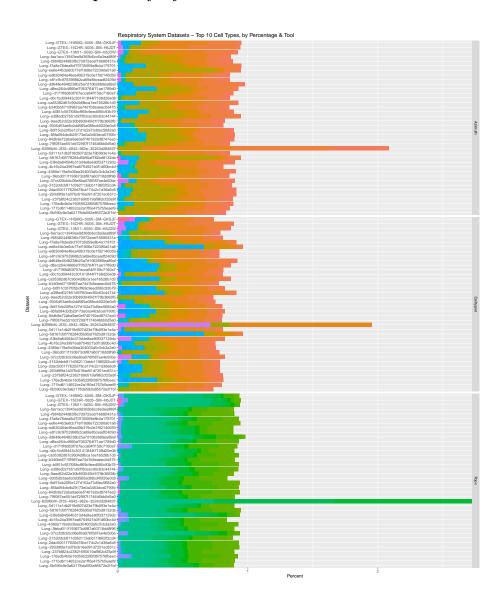
```
## [1] "respiratory system"
## [2] "heart"
## [3] "skin of body"
## [4] "Set of lactiferous glands in right breast"
## [5] "right kidney"
## [6] "large intestine"
## [7] "small intestine"
## [8] "left kidney"
## [9] "urinary bladder"
## [10] "left ureter"
## [11] "spleen"
## [12] "male reproductive system"
## [13] "liver"
```



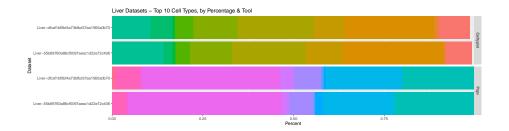
- 4 Creating labels for bar plots
- 5 Pivot table
- 6 Ranking dataset cell types by organ and tool
- 7 Stacked Bar Graphs
- 7.1 Heart Datasets



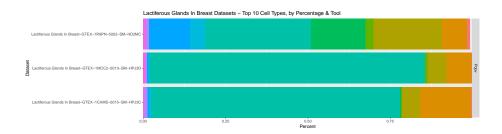
## 7.2 Respiratory System Datasets



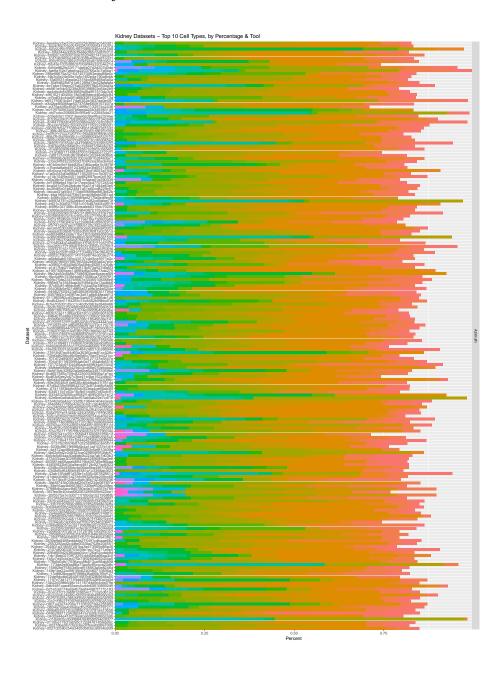
# 7.3 Liver Datasets



## 7.4 Lactiferous Glands In Breast Datasets



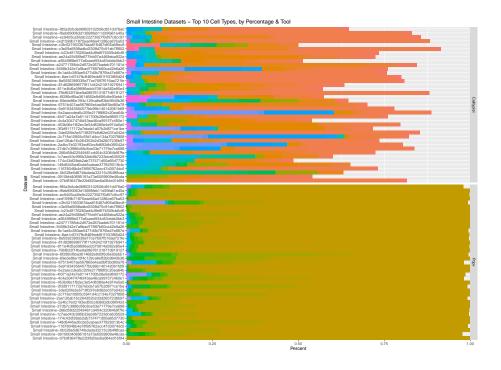
## 7.5 Kidney Datasets



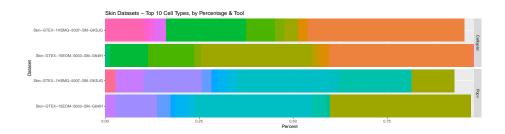
## 7.6 Large Intestine Datasets



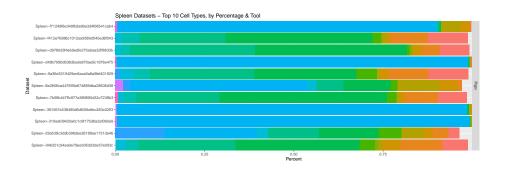
#### 7.7 Small Intestine Datasets



#### 7.8 Skin Datasets



# 7.9 Spleen Datasets



#### 7.10 Ureter Datasets

