

stout mateusz's

- Gravity **13.8 BLG**
- ABV ---
- IBU **77**
- SRM **34.6**
- Style **Dry Stout**

Batch size

- Expected quantity of finished beer **10 liter(s)**
- Trub loss **5 %**
- Size with trub loss **10.5 liter(s)**
- Boil time **60 min**
- Evaporation rate **7 %/h**
- Boil size **12 liter(s)**

Mash information

- Mash efficiency **80 %**
- Liquor-to-grist ratio **3.5 liter(s) / kg**
- Mash size **8.8 liter(s)**
- Total mash volume **11.3 liter(s)**

Steps

- Temp **64 C**, Time **30 min**
- Temp **67 C**, Time **35 min**
- Temp **75 C**, Time **10 min**

Mash step by step

- Heat up **8.8 liter(s)** of strike water to **70.3C**
- Add grains
- Keep mash **30 min** at **64C**
- Keep mash **35 min** at **67C**
- Keep mash **10 min** at **75C**
- Sparge using **5.7 liter(s)** of **76C** water or to achieve **12 liter(s)** of wort

Fermentables

| Type | Name | Amount | Yield | EBC |
|-------|------------------------------|---------------|-------|-----|
| Grain | Pale Malt (2 Row) UK | 1.85 kg (74%) | 78 % | 6 |
| Grain | Oats, Flaked | 0.3 kg (12%) | 80 % | 2 |
| Grain | Briess - Black Malt | 0.15 kg (6%) | 55 % | 985 |
| Grain | Briess - Dark Chocolate Malt | 0.2 kg (8%) | 60 % | 827 |

Hops

| Use for | Name | Amount | Time | Alpha acid |
|---------|---------|--------|----------|------------|
| Boil | Magnum | 25 g | 60 min | 13.5 % |
| Dry Hop | Mosaic | 10 g | 3 day(s) | 10 % |
| Dry Hop | Cascade | 10 g | 3 day(s) | 6 % |

Yeasts

| Name | Type | Form | Amount | Laboratory |
|-------------|------|-------|--------|------------|
| Safale S-04 | Ale | Slant | 100 ml | Safale |