

Guinness Clone

- Gravity **11.2 BLG**
- ABV **4.5 %**
- IBU **40**
- SRM **39.8**

Batch size

- Expected quantity of finished beer **20 liter(s)**
- Trub loss **0 %**
- Size with trub loss **20 liter(s)**
- Boil time **60 min**
- Evaporation rate **15 %/h**
- Boil size **25.3 liter(s)**

Mash information

- Mash efficiency **70 %**
- Liquor-to-grist ratio **4 liter(s) / kg**
- Mash size **18.1 liter(s)**
- Total mash volume **22.7 liter(s)**

Steps

- Temp **57 C**, Time **30 min**
- Temp **67 C**, Time **90 min**
- Temp **76 C**, Time **15 min**

Mash step by step

- Heat up **18.1 liter(s)** of strike water to **61.6C**
- Add grains
- Keep mash **30 min** at **57C**
- Keep mash **90 min** at **67C**
- Keep mash **15 min** at **76C**
- Sparge using **11.7 liter(s)** of **76C** water or to achieve **25.3 liter(s)** of wort

Fermentables

| Type | Name | Amount | Yield | EBC |
|-------|------------------------|-----------------|--------|------|
| Grain | Pale Malt, Maris Otter | 3 kg (66.2%) | 82.5 % | 7 |
| Grain | Barley, Flaked | 1.03 kg (22.7%) | 76.1 % | 4 |
| Grain | Roasted Barley | 0.5 kg (11%) | 74 % | 1624 |

Hops

| Use for | Name | Amount | Time | Alpha acid |
|---------|--------------------------|--------|--------|------------|
| Boil | East Kent Goldings (EKG) | 50 g | 60 min | 4.7 % |
| Boil | Marynka | 10 g | 60 min | 10 % |

Yeasts

| Name | Type | Form | Amount | Laboratory |
|-----------|------|--------|-----------|-------------|
| Irish Ale | Ale | Liquid | 926.78 ml | Wyeast Labs |