

cochceszosenazywaj

- Gravity **14 BLG**
- ABV **5.8 %**
- IBU **18**
- SRM **20.5**
- Style **Brown Porter**

Batch size

- Expected quantity of finished beer **11 liter(s)**
- Trub loss **5 %**
- Size with trub loss **11.6 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **14 liter(s)**

Mash information

- Mash efficiency **80 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **8.9 liter(s)**
- Total mash volume **11.8 liter(s)**

Steps

- Temp **66 C**, Time **60 min**
- Temp **75 C**, Time **15 min**

Mash step by step

- Heat up **8.9 liter(s)** of strike water to **73.6C**
- Add grains
- Keep mash **60 min** at **66C**
- Keep mash **15 min** at **75C**
- Sparge using **8.1 liter(s)** of **76C** water or to achieve **14 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Grain	Viking Pale Ale malt	2.5 kg (84.7%)	80 %	5
Grain	Biscuit Malt	0.25 kg (8.5%)	79 %	45
Grain	Czekoladowy	0.2 kg (6.8%)	60 %	788

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Cascade PL	20 g	45 min	5.2 %

Yeasts

Name	Type	Form	Amount	Laboratory
FM11 Wichrowe Wzgórza	Ale	Slant	100 ml	Fermentum Mobile