

milk stout

- Gravity **16.1 BLG**
- ABV **6.8 %**
- IBU **52**
- SRM **36.1**
- Style **Sweet Stout**

Batch size

- Expected quantity of finished beer **19 liter(s)**
- Trub loss **5 %**
- Size with trub loss **20.9 liter(s)**
- Boil time **70 min**
- Evaporation rate **10 %/h**
- Boil size **25.5 liter(s)**

Mash information

- Mash efficiency **80 %**
- Liquor-to-grist ratio **3.5 liter(s) / kg**
- Mash size **21.3 liter(s)**
- Total mash volume **27.4 liter(s)**

Steps

- Temp **69 C**, Time **60 min**
- Temp **70 C**, Time **15 min**
- Temp **78 C**, Time **10 min**

Mash step by step

- Heat up **21.3 liter(s)** of strike water to **76C**
- Add grains
- Keep mash **60 min** at **69C**
- Keep mash **15 min** at **70C**
- Keep mash **10 min** at **78C**
- Sparge using **10.3 liter(s)** of **76C** water or to achieve **25.5 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Grain	Viking Pale Ale malt	3.6 kg (59%)	80 %	5
Grain	Strzegom Monachijski typ II	0.7 kg (11.5%)	79 %	22
Grain	Pszeniczny	0.5 kg (8.2%)	85 %	4
Grain	Płatki owsiane	0.5 kg (8.2%)	85 %	3
Grain	Chocolate Malt (UK)	0.3 kg (4.9%)	73 %	887
Grain	Weyermann - Carafa II	0.3 kg (4.9%)	70 %	837
Grain	Jęczmień palony	0.2 kg (3.3%)	55 %	985

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Nugget	35 g	70 min	13 %
Boil	Tillicum	15 g	10 min	13 %
Dry Hop	Tillicum	10 g	10 day(s)	13 %
Dry Hop	Amarillo	10 g	10 day(s)	9.5 %

Yeasts

Name	Type	Form	Amount	Laboratory
Safale US-05	Ale	Dry	10 g	Fermentis

Extras

Type	Name	Amount	Use for	Time
Flavor	malina	2000 g	Secondary	10 day(s)
Flavor	laktoza	250 g	Boil	10 min