stout

- Gravity **12.1 BLG**
- ABV **4.9 %**
- IBU **35**
- SRM **28**
- Style **Dry Stout**

Batch size

- Expected quantity of finished beer **22 liter(s)**
- Trub loss **5 %**
- Size with trub loss **23.1 liter(s)**
- Boil time **60 min**
- Evaporation rate **8 %/h**
- Boil size **26.9 liter(s)**

Mash information

- Mash efficiency **80 %**
- Liquor-to-grist ratio **3.5 liter(s) / kg**
- Mash size **16.3 liter(s)**
- Total mash volume **20.9 liter(s)**

Steps

- Temp **64 C**, Time **60 min**
- Temp **75 C**, Time **1 min**

Mash step by step

- Heat up **16.3 liter(s)** of strike water to **70.3C**
- Add grains
- Keep mash **60 min** at **64C**
- Keep mash **1 min** at **75C**
- Sparge using **15.3 liter(s)** of **76C** water or to achieve **26.9 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Grain	BESTMALZ - Bestt Pale Ale	4 kg *(82.5%)*	80.5 %	6
Grain	Palony jęczmień Weyermann	0.43 kg *(8.9%)*	55 %	1000
Grain	castle malting coffe	0.22 kg *(4.5%)*	78 %	500
Sugar	cukier	0.2 kg *(4.1%)*	100 %	1

Hops

Use for	Name	Amount	Time	Alpha acid
First Wort	lunga	20 g	60 min	12.4 %
Boil	lunga	15 g	10 min	12.4 %

Yeasts

Name	Type	Form	Amount	Laboratory
hot head	Ale	Slant	200 ml	po 102

Extras

Type	Name	Amount	Use for	Time
Fining	whirlfloc t	0.5 g	Boil	10 min

Recipe has been printed via **BREWNESS.com** - a complex online solution for homebrewers to track brewing process easily.