Foreign Smoked Stout 16

- Gravity **15.9 BLG**
- ABV **6.7 %**
- IBU **38**
- SRM **42.9**
- Style **Foreign Extra 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 **18 %/h**
- Boil size **32.5 liter(s)**

Mash information

- Mash efficiency **80 %**
- Liquor-to-grist ratio **2.7 liter(s) / kg**
- Mash size **20.4 liter(s)**
- Total mash volume **27.9 liter(s)**

Steps

- Temp **66 C**, Time **60 min**
- Temp **76 C**, Time **5 min**

Mash step by step

- Heat up **20.4 liter(s)** of strike water to **74.5C**
- Add grains
- Keep mash **60 min** at **66C**
- Keep mash **5 min** at **76C**
- Sparge using **19.7 liter(s)** of **76C** water or to achieve **32.5 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Grain	Viking Pale Ale malt	4.1 kg *(54.3%)*	80 %	5
Grain	Słód Wędzony Steinbach	1.25 kg *(16.6%)*	80 %	5
Grain	Brown Malt (British Chocolate)	0.4 kg *(5.3%)*	70 %	128
Grain	Chocolate Malt (UK)	0.4 kg *(5.3%)*	73 %	887
Grain	Fawcett - Pale Chocolate	0.4 kg *(5.3%)*	71 %	600
Grain	Jęczmień palony	0.5 kg *(6.6%)*	55 %	985
Grain	płatki jęczmienne	0.5 kg *(6.6%)*	60 %	4

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Target	45 g	60 min	10.5 %