

## #20 Whisky Extra Stout

- Gravity **16.1 BLG**
- ABV **6.8 %**
- IBU **38**
- SRM **36.8**
- Style **Foreign Extra Stout**

### Batch size

- Expected quantity of finished beer **25 liter(s)**
- Trub loss **5 %**
- Size with trub loss **26.3 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **31.7 liter(s)**

### Mash information

- Mash efficiency **77 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **23.7 liter(s)**
- Total mash volume **31.6 liter(s)**

### Steps

- Temp **68 C**, Time **60 min**
- Temp **75 C**, Time **15 min**

### Mash step by step

- Heat up **23.7 liter(s)** of strike water to **76C**
- Add grains
- Keep mash **60 min** at **68C**
- Keep mash **15 min** at **75C**
- Sparge using **15.9 liter(s)** of **76C** water or to achieve **31.7 liter(s)** of wort

### Fermentables

Type	Name	Amount	Yield	EBC
Grain	Whisky Malt Castle Malting (30-45 ppm)	4.5 kg (53.6%)	79 %	10
Grain	Pale Ale Malt Castle Malting (2 Row)	1 kg (11.9%)	78 %	6
Grain	Castle Malting Monachijski	1 kg (11.9%)	80 %	20
Grain	Caraaroma	0.6 kg (7.1%)	78 %	400
Grain	Carafa III	0.2 kg (2.4%)	70 %	1034
Grain	Weyermann - Chocolate Wheat	0.2 kg (2.4%)	74 %	788
Grain	Jęczmień palony	0.4 kg (4.8%)	70 %	740
Adjunct	Płatki jęczmienne	0.5 kg (6%)	20 %	2

### Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Challenger	50 g	60 min	6 %
Boil	Fuggles	25 g	30 min	4.5 %
Boil	Fuggles	25 g	20 min	4.5 %
Boil	Fuggles	25 g	10 min	4.5 %

## Yeasts

Name	Type	Form	Amount	Laboratory
Safale US-05	Ale	Dry	11.5 g	Fermentis

## Extras

Type	Name	Amount	Use for	Time
Fining	Mech Irlandzki	5 g	Boil	10 min
Flavor	Płatki dębowe po Whisky	35 g	Secondary	14 day(s)