

## #065 American Stout

- Gravity **17.7 BLG**
- ABV **7.6 %**
- IBU **67**
- SRM **43.9**
- Style **American Stout**

### Batch size

- Expected quantity of finished beer **20 liter(s)**
- Trub loss **10 %**
- Size with trub loss **22 liter(s)**
- Boil time **60 min**
- Evaporation rate **19 %/h**
- Boil size **29 liter(s)**

### Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **25.2 liter(s)**
- Total mash volume **33.6 liter(s)**

### Steps

- Temp **65 C**, Time **40 min**
- Temp **68 C**, Time **30 min**
- Temp **78 C**, Time **10 min**

### Mash step by step

- Heat up **25.2 liter(s)** of strike water to **72.5C**
- Add grains
- Keep mash **40 min** at **65C**
- Keep mash **30 min** at **68C**
- Keep mash **10 min** at **78C**
- Sparge using **12.2 liter(s)** of **76C** water or to achieve **29 liter(s)** of wort

### Fermentables

Type	Name	Amount	Yield	EBC
Grain	Viking Pilsner malt	3 kg (35.7%)	82 %	4
Grain	Viking Pale Ale malt	3.1 kg (36.9%)	80 %	5
Grain	płatki jęczmienne	1 kg (11.9%)	60 %	4
Grain	Jęczmień palony	0.8 kg (9.5%)	55 %	985
Grain	Weyermann - Chocolate Rye	0.5 kg (6%)	20 %	493

### Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Chinook	20 g	60 min	11.5 %
Boil	Chinook	30 g	10 min	11.5 %
Boil	Galaxy	30 g	10 min	16.5 %
Boil	Idaho 7	50 g	10 min	14.1 %
Dry Hop	Simcoe	50 g	3 day(s)	12.9 %

### Yeasts

Name	Type	Form	Amount	Laboratory
Safale US-05	Ale	Slant	350 ml	Fermentis

## Extras

Type	Name	Amount	Use for	Time
Fining	whirfloc T	1.25 g	Boil	10 min
Other	pożywka dla drożdży Wyeast	2 g	Boil	10 min