

## #2 Stout

- Gravity **12.1 BLG**
- ABV ---
- IBU **39**
- SRM **43.5**
- Style **Sweet Stout**

### Batch size

- Expected quantity of finished beer **24 liter(s)**
- Trub loss **5 %**
- Size with trub loss **25.2 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **30.4 liter(s)**

### Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **3.2 liter(s) / kg**
- Mash size **17 liter(s)**
- Total mash volume **22.3 liter(s)**

### Steps

- Temp **67 C**, Time **90 min**
- Temp **72 C**, Time **10 min**
- Temp **76 C**, Time **0 min**

### Mash step by step

- Heat up **17 liter(s)** of strike water to **74.3C**
- Add grains
- Keep mash **90 min** at **67C**
- Keep mash **10 min** at **72C**
- Keep mash **0 min** at **76C**
- Sparge using **18.7 liter(s)** of **76C** water or to achieve **30.4 liter(s)** of wort

### Fermentables

Type	Name	Amount	Yield	EBC
Grain	Weyermann - Pale Ale Malt	1.5 kg (28.3%)	85 %	7
Grain	Viking Pale Ale malt	2.5 kg (47.2%)	80 %	6
Grain	Weyermann pszeniczny ciemny	0.5 kg (9.4%)	80 %	16
Grain	Caraaroma	0.3 kg (5.7%)	78 %	350
Grain	Jęczmień palony	0.3 kg (5.7%)	55 %	1000
Grain	Strzegom Czekoladowy ciemny	0.2 kg (3.8%)	68 %	1200

### Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Marynka	35 g	60 min	9.5 %
Boil	Lublin (Lubelski)	40 g	10 min	3.6 %

### Yeasts

Name	Type	Form	Amount	Laboratory
Safale S-04	Ale	Slant	500 ml	---