

American Stout

- Gravity **14.3 BLG**
- ABV **5.9 %**
- IBU **48**
- SRM **33.2**
- Style **American Stout**

Batch size

- Expected quantity of finished beer **20 liter(s)**
- Trub loss **5 %**
- Size with trub loss **21 liter(s)**
- Boil time **60 min**
- Evaporation rate **5 %/h**
- Boil size **23.1 liter(s)**

Mash information

- Mash efficiency **80 %**
- Liquor-to-grist ratio **3.7 liter(s) / kg**
- Mash size **19.6 liter(s)**
- Total mash volume **24.9 liter(s)**

Steps

- Temp **66 C**, Time **60 min**
- Temp **78 C**, Time **10 min**

Mash step by step

- Heat up **19.6 liter(s)** of strike water to **72.2C**
- Add grains
- Keep mash **60 min** at **66C**
- Keep mash **10 min** at **78C**
- Sparge using **8.8 liter(s)** of **76C** water or to achieve **23.1 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Grain	Strzegom Pilzneński	1 kg (18.9%)	80 %	4
Grain	Viking Pale Ale malt	3 kg (56.6%)	80 %	5
Grain	Strzegom Pszeniczny	0.3 kg (5.7%)	81 %	6
Grain	Strzegom Karmel 150	0.2 kg (3.8%)	75 %	150
Grain	Strzegom Karmel 300	0.2 kg (3.8%)	70 %	299
Grain	Strzegom Czekoladowy ciemny	0.25 kg (4.7%)	68 %	1200
Grain	Strzegom Barwiący	0.1 kg (1.9%)	68 %	1300
Grain	Strzegom Czekoladowy jasny	0.25 kg (4.7%)	68 %	400

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Citra	25 g	60 min	12 %
Boil	Citra	20 g	20 min	12 %