

## Espresso stout- Scooby

- Gravity **11.9 BLG**
- ABV **4.8 %**
- IBU **24**
- SRM **25**

### Batch size

- Expected quantity of finished beer **21 liter(s)**
- Trub loss **5 %**
- Size with trub loss **22.1 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **26.5 liter(s)**

### Mash information

- Mash efficiency **70 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **16.1 liter(s)**
- Total mash volume **21.5 liter(s)**

### Steps

- Temp **67 C**, Time **60 min**

### Mash step by step

- Heat up **16.1 liter(s)** of strike water to **74.8C**
- Add grains
- Keep mash **60 min** at **67C**
- Sparge using **15.8 liter(s)** of **76C** water or to achieve **26.5 liter(s)** of wort

### Fermentables

Type	Name	Amount	Yield	EBC
Grain	Briess - Pilsen Malt	4 kg (74.4%)	80.5 %	4
Grain	Pszeniczny	0.5 kg (9.3%)	85 %	15
Grain	Caramel/Crystal Malt - 60L	0.5 kg (9.3%)	74 %	25
Grain	Czekoladowy	0.25 kg (4.7%)	60 %	1200
Grain	Jęczmień palony	0.125 kg (2.3%)	55 %	1000

### Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Marynka	20 g	60 min	9 %
Boil	Willamette	25 g	10 min	5 %

### Yeasts

Name	Type	Form	Amount	Laboratory
US-05	Ale	Dry	11 g	---

### Extras

Type	Name	Amount	Use for	Time
Flavor	Kawa mielona espresso	100 g	Boil	1 min