

## RIS na raty

- Gravity **36.7 BLG**
- ABV ---
- IBU **49**
- SRM **40**
- Style **Russian Imperial 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 **10 %/h**
- Boil size **25.3 liter(s)**

### Mash information

- Mash efficiency **70 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **48.9 liter(s)**
- Total mash volume **65.2 liter(s)**

### Steps

- Temp **68 C**, Time **90 min**

### Mash step by step

- Heat up **48.9 liter(s)** of strike water to **76C**
- Add grains
- Keep mash **90 min** at **68C**
- Sparge using **-7.3 liter(s)** of **76C** water or to achieve **25.3 liter(s)** of wort

### Fermentables

Type	Name	Amount	Yield	EBC
Grain	Strzegom Pale Ale	10 kg (61.3%)	79 %	6
Grain	Briess - 2 Row Carapils Malt	2.5 kg (15.3%)	75 %	3
Grain	Caramel/Crystal Malt - 40L	2.5 kg (15.3%)	74 %	79
Grain	Jęczmień palony	0.8 kg (4.9%)	55 %	985
Grain	Strzegom Czekoladowy ciemny	0.5 kg (3.1%)	68 %	1200

### Hops

Use for	Name	Amount	Time	Alpha acid
Aroma (end of boil)	Kent Goldings	50 g	15 min	5.5 %
Boil	Marynka	75 g	60 min	10 %
Boil	Magnum	15 g	60 min	13.5 %

### Yeasts

Name	Type	Form	Amount	Laboratory
Safale S-04	Ale	Dry	22.5 g	Safale

### Extras

Type	Name	Amount	Use for	Time
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Other	płatki dębowe	50 g	Secondary	14 day(s)
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