

Hoppy Rye Imperial Stout

- Gravity **24.9 BLG**
- ABV **11.6 %**
- IBU **90**
- SRM **61.8**
- Style **Russian Imperial Stout**

Batch size

- Expected quantity of finished beer **8 liter(s)**
- Trub loss **0 %**
- Size with trub loss **8.4 liter(s)**
- Boil time **90 min**
- Evaporation rate **10 %/h**
- Boil size **10.6 liter(s)**

Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **2.5 liter(s) / kg**
- Mash size **10.5 liter(s)**
- Total mash volume **14.7 liter(s)**

Steps

- Temp **66 C**, Time **60 min**
- Temp **72 C**, Time **30 min**
- Temp **78 C**, Time **1 min**

Mash step by step

- Heat up **10.5 liter(s)** of strike water to **75.2C**
- Add grains
- Keep mash **60 min** at **66C**
- Keep mash **30 min** at **72C**
- Keep mash **1 min** at **78C**
- Sparge using **4.3 liter(s)** of **76C** water or to achieve **10.6 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Grain	Strzegom Pilzneński	1.5 kg (35.7%)	80 %	4
Grain	Żytni	1 kg (23.8%)	85 %	8
Grain	Rye, Flaked	0.8 kg (19%)	78.3 %	4
Grain	Fawcett - Pszeniczny Czekoladowy	0.2 kg (4.8%)	73 %	1001
Grain	Special B Castle	0.4 kg (9.5%)	70 %	350
Grain	Weyermann - Carafa III	0.3 kg (7.1%)	70 %	1024

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Columbus/Tomahawk/Zeus	20 g	60 min	15.5 %
Boil	Chinook	10 g	20 min	13 %
Boil	Chinook	10 g	10 min	13 %
Whirlpool	Chinook	30 g	15 min	13 %
Dry Hop	Sorachi Ace	100 g	3 day(s)	10 %

Yeasts

Name	Type	Form	Amount	Laboratory
FM54 Gorączka kalifornijska	Ale	Slant	300 ml	Fermentum Mobile