ris

- Gravity **27.2 BLG**
- ABV **13 %**
- IBU **104**
- SRM **68.2**
- Style **Russian Imperial Stout**

Batch size

- Expected quantity of finished beer **19.5 liter(s)**
- Trub loss **5 %**
- Size with trub loss **20.5 liter(s)**
- Boil time **90 min**
- Evaporation rate **18 %/h**
- Boil size **28.4 liter(s)**

Mash information

- Mash efficiency **80 %**
- Liquor-to-grist ratio **2 liter(s) / kg**
- Mash size **18 liter(s)**
- Total mash volume **27 liter(s)**

Steps

- Temp **63 C**, Time **60 min**
- Temp **76 C**, Time **5 min**

Mash step by step

- Heat up **18 liter(s)** of strike water to **73.8C**
- Add grains
- Keep mash **60 min** at **63C**
- Keep mash **5 min** at **76C**
- Sparge using **19.4 liter(s)** of **76C** water or to achieve **28.4 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Liquid Extract	WES ekstrakt słodowy jasny	1.2 kg *(11.8%)*	80 %	40
Grain	Viking Pale Ale malt	3 kg *(29.4%)*	80 %	5
Grain	Słód Wędzony Weyermann	3 kg *(29.4%)*	80 %	5
Grain	Monachijski Ciemny 19-25 EBC Viking Malt	1.4 kg *(13.7%)*	79 %	22
Grain	Black Crisp	0.4 kg *(3.9%)*	55 %	1300
Grain	Pszeniczny Czekoladowy Weyermann	0.4 kg *(3.9%)*	73 %	1001
Grain	Jęczmień palony Weyermann	0.4 kg *(3.9%)*	55 %	1100
Grain	pszenica prażona Viking Malt	0.4 kg *(3.9%)*	70 %	1000
Sugar	cukier	0 kg	100 %	0

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Chinook	100 g	60 min	13 %

Recipe has been printed via **BREWNESS.com** - a complex online solution for homebrewers to track brewing process easily.

Boil	Columbus/Tomahawk/Zeus	30 g	30 min	15.5 %

Yeasts

Name	Type	Form	Amount	Laboratory
Safale US-05	Ale	Slant	250 ml	Fermentis

Extras

Type	Name	Amount	Use for	Time
Other	Płatki (chipsy) dębowe Whisky	50 g	Secondary	30 day(s)
Fining	Whirlfloc	6 g	Boil	5 min

Recipe has been printed via **BREWNESS.com** - a complex online solution for homebrewers to track brewing process easily.