

## #57

- Gravity **19.3 BLG**
- ABV **8.4 %**
- IBU **33**
- SRM **46.4**

### 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 **24.2 liter(s)**

### Mash information

- Mash efficiency **80 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **20.3 liter(s)**
- Total mash volume **27.1 liter(s)**

### Steps

- Temp **68 C**, Time **70 min**

### Mash step by step

- Heat up **20.3 liter(s)** of strike water to **76C**
- Add grains
- Keep mash **70 min** at **68C**
- Sparge using **10.7 liter(s)** of **76C** water or to achieve **24.2 liter(s)** of wort

### Fermentables

Type	Name	Amount	Yield	EBC
Grain	Viking Pale Ale malt	5 kg (69.6%)	80 %	5
Grain	Strzegom Czekoladowy ciemny	0.5 kg (7%)	68 %	1200
Grain	Jęczmień palony	0.33 kg (4.6%)	55 %	985
Grain	Strzegom Karmel 300	0.3 kg (4.2%)	70 %	299
Grain	Jęczmień niesłodowany	0.4 kg (5.6%)	75 %	2
Sugar	Candi Sugar, Clear	0.4 kg (5.6%)	78.3 %	2
Grain	Rye Malt	0.25 kg (3.5%)	63 %	10

### Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Columbus/Tomahawk/Zeus	25 g	55 min	15.5 %

### Yeasts

Name	Type	Form	Amount	Laboratory
Lallemand - LalBrew Voss Kveik	Ale	Slant	50 ml	Lallemand