

nzipa

- Gravity **13.8 BLG**
- ABV **5.7 %**
- IBU **59**
- SRM **10.3**

Batch size

- Expected quantity of finished beer **23 liter(s)**
- Trub loss **5 %**
- Size with trub loss **24.1 liter(s)**
- Boil time **70 min**
- Evaporation rate **10 %/h**
- Boil size **29.5 liter(s)**

Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **19.2 liter(s)**
- Total mash volume **25.6 liter(s)**

Steps

- Temp **62 C**, Time **45 min**
- Temp **72 C**, Time **25 min**

Mash step by step

- Heat up **19.2 liter(s)** of strike water to **69C**
- Add grains
- Keep mash **45 min** at **62C**
- Keep mash **25 min** at **72C**
- Sparge using **16.7 liter(s)** of **76C** water or to achieve **29.5 liter(s)** of wort

Fermentables

| Type | Name | Amount | Yield | EBC |
|-------|------------------------------|---------------|-------|-----|
| Grain | Viking Pale Ale malt | 5 kg (78.1%) | 80 % | 5 |
| Grain | Strzegom Karmel 150 | 0.5 kg (7.8%) | 75 % | 150 |
| Grain | Viking melanoidynowy red ale | 0.5 kg (7.8%) | 75 % | 60 |
| Grain | Płatki orkiszowe | 0.1 kg (1.6%) | 80 % | 4 |
| Grain | Płatki owsiane | 0.3 kg (4.7%) | 85 % | 3 |

Hops

| Use for | Name | Amount | Time | Alpha acid |
|---------------------|---------------|--------|----------|------------|
| Boil | Vic Secret | 30 g | 60 min | 19.3 % |
| Aroma (end of boil) | Nelson Sauvín | 30 g | 5 min | 11 % |
| Dry Hop | Motueka | 50 g | 5 day(s) | 7 % |

Yeasts

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