

AIPA

- Gravity **15.9 BLG**
- ABV **6.7 %**
- IBU **68**
- SRM **7.8**
- Style **American IPA**

Batch size

- Expected quantity of finished beer **23 liter(s)**
- Trub loss **5 %**
- Size with trub loss **24.1 liter(s)**
- Boil time **60 min**
- Evaporation rate **15 %/h**
- Boil size **30.4 liter(s)**

Mash information

- Mash efficiency **90 %**
- Liquor-to-grist ratio **3.2 liter(s) / kg**
- Mash size **19.8 liter(s)**
- Total mash volume **26 liter(s)**

Steps

- Temp **65 C**, Time **60 min**
- Temp **72 C**, Time **15 min**
- Temp **76 C**, Time **5 min**

Mash step by step

- Heat up **19.8 liter(s)** of strike water to **72C**
- Add grains
- Keep mash **60 min** at **65C**
- Keep mash **15 min** at **72C**
- Keep mash **5 min** at **76C**
- Sparge using **16.8 liter(s)** of **76C** water or to achieve **30.4 liter(s)** of wort

Fermentables

| Type | Name | Amount | Yield | EBC |
|-------|------------------------|----------------|-------|-----|
| Grain | Pale Ale (Malteurop) | 5.3 kg (85.5%) | 80 % | 8.5 |
| Grain | Pszeniczny | 0.35 kg (5.6%) | 85 % | 4 |
| Grain | Strzegom Karmel 150 | 0.25 kg (4%) | 75 % | 150 |
| Grain | Barley, Flaked | 0.3 kg (4.8%) | 70 % | 4 |

Hops

| Use for | Name | Amount | Time | Alpha acid |
|------------|----------|--------|--------|------------|
| First Wort | lunga | 10 g | 60 min | 11 % |
| First Wort | Cascade | 10 g | 60 min | 6.9 % |
| First Wort | Amarillo | 10 g | 60 min | 8.5 % |
| Boil | Cascade | 25 g | 20 min | 6.9 % |
| Boil | Amarillo | 25 g | 20 min | 8.5 % |
| Boil | Cascade | 25 g | 10 min | 6.9 % |
| Boil | Amarillo | 25 g | 10 min | 8.5 % |
| Whirlpool | Amarillo | 20 g | 50 min | 8.5 % |
| Whirlpool | Cascade | 20 g | 50 min | 6.9 % |

Yeasts

| Name | Type | Form | Amount | Laboratory |
|--------------|------|-------|--------|------------|
| Safale US-05 | Ale | Slant | 400 ml | Fermentis |