

## KRAKÓW - e.14. - 24.04.2022r.

- Gravity **10.5 BLG**
- ABV **4.2 %**
- IBU **30**
- SRM **3.7**
- Style **American Pale Ale**

### Batch size

- Expected quantity of finished beer **18 liter(s)**
- Trub loss **5 %**
- Size with trub loss **18.9 liter(s)**
- Boil time **60 min**
- Evaporation rate **15 %/h**
- Boil size **23.8 liter(s)**

### Mash information

- Mash efficiency **91 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **8.7 liter(s)**
- Total mash volume **11.6 liter(s)**

### Steps

- Temp **62 C**, Time **45 min**
- Temp **72 C**, Time **15 min**
- Temp **76 C**, Time **1 min**

### Mash step by step

- Heat up **8.7 liter(s)** of strike water to **69C**
- Add grains
- Keep mash **45 min** at **62C**
- Keep mash **15 min** at **72C**
- Keep mash **1 min** at **76C**
- Sparge using **18 liter(s)** of **76C** water or to achieve **23.8 liter(s)** of wort

### Fermentables

| Type  | Name                      | Amount        | Yield | EBC |
|-------|---------------------------|---------------|-------|-----|
| Grain | Weyermann - Pale Ale Malt | 2.9 kg (100%) | 85 %  | 7   |

### Hops

| Use for   | Name     | Amount | Time     | Alpha acid |
|-----------|----------|--------|----------|------------|
| Boil      | Sabro    | 10 g   | 60 min   | 13.3 %     |
| Boil      | Sabro    | 10 g   | 15 min   | 13.3 %     |
| Whirlpool | Sabro    | 10 g   | 5 min    | 13.3 %     |
| Whirlpool | Amarillo | 12 g   | 5 min    | 9.9 %      |
| Dry Hop   | Amarillo | 25 g   | 1 day(s) | 9.9 %      |

### Yeasts

| Name         | Type | Form | Amount | Laboratory |
|--------------|------|------|--------|------------|
| Safale US-05 | Ale  | Dry  | 11.5 g | Fermentis  |