

Żytnie APA niskokoalowe

- Gravity **7.1 BLG**
- ABV ---
- IBU **21**
- SRM **9.6**
- Style **American Pale Ale**

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 **25.3 liter(s)**

Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **4 liter(s) / kg**
- Mash size **10 liter(s)**
- Total mash volume **12.5 liter(s)**

Steps

- Temp **47 C**, Time **10 min**
- Temp **72 C**, Time **60 min**

Mash step by step

- Heat up **10 liter(s)** of strike water to **50.4C**
- Add grains
- Keep mash **10 min** at **47C**
- Keep mash **60 min** at **72C**
- Sparge using **17.8 liter(s)** of **76C** water or to achieve **25.3 liter(s)** of wort

Fermentables

| Type | Name | Amount | Yield | EBC |
|-------|-----------------------|--------------|-------|-----|
| Grain | Strzegom Pale Ale | 1 kg (40%) | 79 % | 6 |
| Grain | Żytni | 1 kg (40%) | 85 % | 8 |
| Grain | Weyermann - Carawheat | 0.5 kg (20%) | 77 % | 97 |

Hops

| Use for | Name | Amount | Time | Alpha acid |
|---------|--------|--------|--------|------------|
| Boil | Mosaic | 10 g | 45 min | 10 % |
| Boil | Mosaic | 10 g | 15 min | 10 % |
| Boil | Citra | 25 g | 0 min | 12 % |
| Dry Hop | Citra | 25 g | --- | 12 % |
| Boil | Simcoe | 10 g | 0 min | 13.2 % |
| Dry Hop | Simcoe | 10 g | --- | 13.2 % |

Yeasts

| Name | Type | Form | Amount | Laboratory |
|--------------|------|------|--------|------------|
| Safale US-05 | Ale | Dry | 10 g | Fermentis |