

#30 APA na lenia

- Gravity **12.4 BLG**
- ABV ---
- IBU **33**
- SRM **4.7**
- Style **American Pale Ale**

Batch size

- Expected quantity of finished beer **25 liter(s)**
- Trub loss **5 %**
- Size with trub loss **26.3 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **31.7 liter(s)**

Mash information

- Mash efficiency **83 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **15 liter(s)**
- Total mash volume **20 liter(s)**

Steps

- Temp **68 C**, Time **60 min**

Mash step by step

- Heat up **15 liter(s)** of strike water to **76C**
- Add grains
- Keep mash **60 min** at **68C**
- Sparge using **21.7 liter(s)** of **76C** water or to achieve **31.7 liter(s)** of wort

Fermentables

| Type | Name | Amount | Yield | EBC |
|-------|-----------------|------------|-------|-----|
| Grain | Pale Ale Flagon | 4 kg (80%) | 80 % | 5 |
| Grain | Żytni | 1 kg (20%) | 85 % | 8 |

Hops

| Use for | Name | Amount | Time | Alpha acid |
|-----------|------------|--------|----------|------------|
| Boil | Nugget | 18 g | 60 min | 15.3 % |
| Boil | Rakau (NZ) | 20 g | 10 min | 9.5 % |
| Whirlpool | Rakau (NZ) | 30 g | 0 min | 9.5 % |
| Dry Hop | Rakau (NZ) | 50 g | 3 day(s) | 9.5 % |

Yeasts

| Name | Type | Form | Amount | Laboratory |
|----------------------|------|-------|--------|------------|
| Danstar - Nottingham | Ale | Slant | 500 ml | Danstar |

Extras

| Type | Name | Amount | Use for | Time |
|-------|-----------------|--------|---------|-------|
| Spice | Trawa cytrynowa | 20 g | Boil | 5 min |