

# ŻLAPA\_V3

- Gravity **7.6 BLG**
- ABV **2.9 %**
- IBU **29**
- SRM **4.4**
- Style **American Pale Ale**

## Batch size

- Expected quantity of finished beer **24 liter(s)**
- Trub loss **5 %**
- Size with trub loss **27.1 liter(s)**
- Boil time **60 min**
- Evaporation rate **8 %/h**
- Boil size **31.9 liter(s)**

## Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **3.5 liter(s) / kg**
- Mash size **12.9 liter(s)**
- Total mash volume **16.6 liter(s)**

## Steps

- Temp **73 C**, Time **60 min**
- Temp **76 C**, Time **10 min**

## Mash step by step

- Heat up **12.9 liter(s)** of strike water to **80.6C**
- Add grains
- Keep mash **60 min** at **73C**
- Keep mash **10 min** at **76C**
- Sparge using **22.7 liter(s)** of **76C** water or to achieve **31.9 liter(s)** of wort

## Fermentables

| Type  | Name                 | Amount         | Yield  | EBC |
|-------|----------------------|----------------|--------|-----|
| Grain | Viking Pale Ale malt | 1 kg (27%)     | 80 %   | 5   |
| Grain | Żytni                | 1 kg (27%)     | 85 %   | 8   |
| Grain | Monachijski Optima   | 1 kg (27%)     | 78.9 % | 18  |
| Grain | Słód Carahell (R)    | 0.3 kg (8.1%)  | 75 %   | 25  |
| Grain | Płatki owsiane       | 0.4 kg (10.8%) | 85 %   | 3   |

## Hops

| Use for    | Name    | Amount | Time     | Alpha acid |
|------------|---------|--------|----------|------------|
| First Wort | Iunga   | 15 g   | 60 min   | 11 %       |
| Boil       | Cascade | 25 g   | 5 min    | 6.9 %      |
| Boil       | Citra   | 25 g   | 5 min    | 13.3 %     |
| Whirlpool  | Cascade | 25 g   | 0 min    | 6.9 %      |
| Whirlpool  | Citra   | 25 g   | 0 min    | 13.3 %     |
| Dry Hop    | Cascade | 30 g   | 4 day(s) | 6.9 %      |
| Dry Hop    | Citra   | 30 g   | 4 day(s) | 13.3 %     |

## Yeasts

| Name | Type | Form | Amount | Laboratory |
|------|------|------|--------|------------|
|------|------|------|--------|------------|

|                                |     |        |         |            |
|--------------------------------|-----|--------|---------|------------|
| WLP090 - San Diego Super Yeast | Ale | Liquid | 1000 ml | White Labs |
|--------------------------------|-----|--------|---------|------------|

### Extras

| Type   | Name        | Amount | Use for | Time   |
|--------|-------------|--------|---------|--------|
| Fining | Whirlfloc T | 1 g    | Boil    | 10 min |

### Notes

- Klarowanie żelatyną, przy rozlewie jeszcze mocno mętne.  
Wyklarowało się w butelkach, osad na dnie zbity w dziwną białawą masę. Da się nalać klarowne do szkła.  
Wyszło mocne wysycenie  
*Jul 24, 2019, 2:32 PM*