

## "plastron gospodarzy" - APA z zestawem warka # 62

- Gravity **11.2 BLG**
- ABV **4.5 %**
- IBU **22**
- SRM **3.4**
- Style **American Pale Ale**

### Batch size

- Expected quantity of finished beer **22 liter(s)**
- Trub loss **5 %**
- Size with trub loss **24.2 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **29 liter(s)**

### Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **4 liter(s) / kg**
- Mash size **20 liter(s)**
- Total mash volume **25 liter(s)**

### Steps

- Temp **66 C**, Time **40 min**
- Temp **72 C**, Time **40 min**

### Mash step by step

- Heat up **20 liter(s)** of strike water to **71.8C**
- Add grains
- Keep mash **40 min** at **66C**
- Keep mash **40 min** at **72C**
- Sparge using **14 liter(s)** of **76C** water or to achieve **29 liter(s)** of wort

### Fermentables

| Type  | Name                | Amount       | Yield | EBC |
|-------|---------------------|--------------|-------|-----|
| Grain | Strzegom Pilzneński | 3.5 kg (70%) | 80 %  | 4   |
| Grain | Pszeniczny          | 1.5 kg (30%) | 85 %  | 4   |

### Hops

| Use for             | Name     | Amount | Time     | Alpha acid |
|---------------------|----------|--------|----------|------------|
| Boil                | Amarillo | 7 g    | 60 min   | 9.5 %      |
| First Wort          | Amarillo | 15 g   | 60 min   | 9.5 %      |
| Aroma (end of boil) | Cascade  | 25 g   | 0 min    | 8.4 %      |
| Aroma (end of boil) | Citra    | 25 g   | 0 min    | 16.5 %     |
| Whirlpool           | cascade  | 25 g   | 0 min    | 8.4 %      |
| Whirlpool           | Citra    | 25 g   | 0 min    | 16.5 %     |
| Dry Hop             | a        | 1 g    | 3 day(s) | 1 %        |
| Dry Hop             | a        | 1 g    | 3 day(s) | 1 %        |
| Dry Hop             | a        | 1 g    | 3 day(s) | 1 %        |

### Yeasts

| Name    | Type | Form  | Amount | Laboratory |
|---------|------|-------|--------|------------|
| wlp4040 | Ale  | Slant | 150 ml | przepona   |

## Extras

| Type   | Name         | Amount | Use for   | Time     |
|--------|--------------|--------|-----------|----------|
| Flavor | zest cytryny | 200 g  | Secondary | 3 day(s) |

## Notes

- woda w wiekrzosci to sok z klonu 27l/34l  
bez chmielu na goryczke. tylko na zacier i fwh.  
dodam zest na cicha.  
mozliwe ze slod jest zamiast pszenicy to zytnei. poznamy po kolorze.  
z racji tego ze woda zostala zamieniona na sok z klonu- ekstrakt podskoczyl finalnie o 2 blg. mamy 13 blg i 20 l.  
*Mar 29, 2024, 10:00 PM*