

ciemna pszenica

- Gravity **11.4 BLG**
- ABV **4.6 %**
- IBU **23**
- SRM **15.1**
- Style **Dunkelweizen**

Batch size

- Expected quantity of finished beer **21 liter(s)**
- Trub loss **5 %**
- Size with trub loss **22.1 liter(s)**
- Boil time **80 min**
- Evaporation rate **10 %/h**
- Boil size **27.3 liter(s)**

Mash information

- Mash efficiency **80 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **13.2 liter(s)**
- Total mash volume **17.6 liter(s)**

Steps

- Temp **46 C**, Time **10 min**
- Temp **53 C**, Time **15 min**
- Temp **64 C**, Time **30 min**
- Temp **72 C**, Time **10 min**

Mash step by step

- Heat up **13.2 liter(s)** of strike water to **50.3C**
- Add grains
- Keep mash **10 min** at **46C**
- Keep mash **15 min** at **53C**
- Keep mash **30 min** at **64C**
- Keep mash **10 min** at **72C**
- Sparge using **18.5 liter(s)** of **76C** water or to achieve **27.3 liter(s)** of wort

Fermentables

| Type | Name | Amount | Yield | EBC |
|-------|-----------------------------|----------------|-------|-----|
| Grain | Pszeniczny | 2 kg (45.5%) | 85 % | 4 |
| Grain | Pilzneński | 1.4 kg (31.8%) | 81 % | 4 |
| Grain | Strzegom Monachijski typ II | 0.6 kg (13.6%) | 79 % | 22 |
| Grain | Strzegom Czekoladowy jasny | 0.2 kg (4.5%) | 68 % | 400 |
| Grain | Carafa II | 0.1 kg (2.3%) | 70 % | 812 |
| Grain | Weyermann Specjal W | 0.1 kg (2.3%) | 68 % | 300 |

Hops

| Use for | Name | Amount | Time | Alpha acid |
|---------|-----------------------|--------|--------|------------|
| Boil | Magnum | 10 g | 60 min | 13.5 % |
| Boil | Saaz (Czech Republic) | 15 g | 30 min | 4.5 % |
| Boil | Saaz (Czech Republic) | 15 g | 10 min | 4.5 % |

Yeasts

Recipe has been printed via **BREWNES.com** - a complex online solution for homebrewers to track brewing process easily.

| Name | Type | Form | Amount | Laboratory |
|------------------------|-------------|-------------|---------------|-------------------|
| FM41 Gwoździe i Banany | Wheat | Slant | 70 ml | Fermentum Mobile |