

Pils 1.0

- Gravity **11 BLG**
- ABV **4.4 %**
- IBU **21**
- SRM **4.4**
- Style **Bohemian Pilsener**

Batch size

- Expected quantity of finished beer **30 liter(s)**
- Trub loss **5 %**
- Size with trub loss **31.5 liter(s)**
- Boil time **80 min**
- Evaporation rate **10 %/h**
- Boil size **39.1 liter(s)**

Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **19.5 liter(s)**
- Total mash volume **26 liter(s)**

Steps

- Temp **55 C**, Time **10 min**
- Temp **63 C**, Time **40 min**
- Temp **72 C**, Time **20 min**
- Temp **76 C**, Time **20 min**

Mash step by step

- Heat up **19.5 liter(s)** of strike water to **60.8C**
- Add grains
- Keep mash **10 min** at **55C**
- Keep mash **40 min** at **63C**
- Keep mash **20 min** at **72C**
- Keep mash **20 min** at **76C**
- Sparge using **26.1 liter(s)** of **76C** water or to achieve **39.1 liter(s)** of wort

Fermentables

| Type | Name | Amount | Yield | EBC |
|-------|---|----------------|-------|-----|
| Grain | Słód Pilsner® 2,5-4,5 EBC Weyermann | 5.5 kg (84.6%) | 80 % | 4 |
| Grain | Strzegom Monachijski typ II | 1 kg (15.4%) | 79 % | 22 |

Hops

| Use for | Name | Amount | Time | Alpha acid |
|---------------------|-----------------------|--------|--------|------------|
| Boil | Saaz (Czech Republic) | 10 g | 70 min | 4 % |
| Boil | Saaz (Czech Republic) | 30 g | 40 min | 4 % |
| Boil | Saaz (Czech Republic) | 30 g | 30 min | 4 % |
| Boil | Saaz (Czech Republic) | 10 g | 30 min | 4 % |
| Aroma (end of boil) | Saaz (Czech Republic) | 30 g | 0 min | 4 % |
| Whirlpool | Saaz (Czech Republic) | 40 g | 20 min | 4 % |

| | | | | |
|---------|-----------------------|-------|----------|-----|
| Dry Hop | Saaz (Czech Republic) | 100 g | 3 day(s) | 4 % |
|---------|-----------------------|-------|----------|-----|

Yeasts

| Name | Type | Form | Amount | Laboratory |
|---------------------------|-------|--------|--------|-------------|
| California lager M54 | Lager | Dry | 10 g | --- |
| Wyeast - California Lager | Lager | Liquid | 125 ml | Wyeast Labs |

Extras

| Type | Name | Amount | Use for | Time |
|--------|----------------|--------|---------|--------|
| Fining | Mech irlandzki | 7 g | Boil | 15 min |