

Czeski Pilsner Radość

- Gravity **13.6 BLG**
- ABV **5.6 %**
- IBU **40**
- SRM **5.5**
- Style **Bohemian Pilsener**

Batch size

- Expected quantity of finished beer **20 liter(s)**
- Trub loss **5 %**
- Size with trub loss **21 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **25.3 liter(s)**

Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **3.5 liter(s) / kg**
- Mash size **19.3 liter(s)**
- Total mash volume **24.8 liter(s)**

Steps

- Temp **55 C**, Time **0 min**
- Temp **64 C**, Time **20 min**
- Temp **72 C**, Time **40 min**
- Temp **76 C**, Time **5 min**

Mash step by step

- Heat up **19.3 liter(s)** of strike water to **60C**
- Add grains
- Keep mash **0 min** at **55C**
- Keep mash **20 min** at **64C**
- Keep mash **40 min** at **72C**
- Keep mash **5 min** at **76C**
- Sparge using **11.5 liter(s)** of **76C** water or to achieve **25.3 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Grain	Strzegom Pilzneński	4.5 kg (81.8%)	80 %	4
Grain	Strzegom Karmel 30	0.5 kg (9.1%)	75 %	30
Grain	Strzegom Monachijski typ I	0.5 kg (9.1%)	79 %	16

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Magnum	25 g	60 min	12.2 %
Aroma (end of boil)	Lublin (Lubelski)	25 g	15 min	6 %

Yeasts

Name	Type	Form	Amount	Laboratory
Safale S-23	Lager	Dry	11.5 g	Fermentis