

Franz Joseph

- Gravity **11.2 BLG**
- ABV **4.5 %**
- IBU **32**
- SRM **4.1**
- 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 liter(s) / kg**
- Mash size **13.2 liter(s)**
- Total mash volume **17.6 liter(s)**

Steps

- Temp **70 C**, Time **0 min**
- Temp **64 C**, Time **30 min**
- Temp **72 C**, Time **30 min**
- Temp **78 C**, Time **10 min**

Mash step by step

- Heat up **13.2 liter(s)** of strike water to **71.3C**
- Add grains
- Keep mash **30 min** at **64C**
- Keep mash **0 min** at **70C**
- Keep mash **30 min** at **72C**
- Keep mash **10 min** at **78C**
- Sparge using **16.5 liter(s)** of **76C** water or to achieve **25.3 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Grain	Pilzneński	3.3 kg (75%)	81 %	4
Grain	Weyermann - Carapils	0.4 kg (9.1%)	78 %	4
Grain	Monachijski	0.7 kg (15.9%)	80 %	16

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Premiant	20 g	10 min	8 %
Boil	Sterling	25 g	50 min	4.5 %
Boil	Sterling	25 g	55 min	4.5 %