

## mix

- Gravity **12.9 BLG**
- ABV **5.2 %**
- IBU **30**
- SRM **4.9**

### 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 **75 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **15.9 liter(s)**
- Total mash volume **21.2 liter(s)**

### Steps

- Temp **45 C**, Time **15 min**
- Temp **55 C**, Time **15 min**
- Temp **62 C**, Time **30 min**
- Temp **72 C**, Time **15 min**
- Temp **77 C**, Time **1 min**

### Mash step by step

- Heat up **15.9 liter(s)** of strike water to **49.2C**
- Add grains
- Keep mash **15 min** at **45C**
- Keep mash **15 min** at **55C**
- Keep mash **30 min** at **62C**
- Keep mash **15 min** at **72C**
- Keep mash **1 min** at **77C**
- Sparge using **16.7 liter(s)** of **76C** water or to achieve **27.3 liter(s)** of wort

### Fermentables

| Type  | Name                 | Amount         | Yield | EBC |
|-------|----------------------|----------------|-------|-----|
| Grain | Pilzneński           | 1.6 kg (30.2%) | 81 %  | 4   |
| Grain | Viking Pale Ale malt | 1.6 kg (30.2%) | 80 %  | 5   |
| Grain | Pszeniczny           | 1.6 kg (30.2%) | 85 %  | 4   |
| Grain | Strzegom Karmel 30   | 0.5 kg (9.4%)  | 75 %  | 30  |

### Hops

| Use for | Name              | Amount | Time   | Alpha acid |
|---------|-------------------|--------|--------|------------|
| Boil    | Lublin (Lubelski) | 50 g   | 50 min | 4 %        |
| Boil    | Lublin (Lubelski) | 50 g   | 15 min | 4 %        |

### Yeasts

| Name | Type  | Form  | Amount | Laboratory |
|------|-------|-------|--------|------------|
| t58  | Lager | Slant | 500 ml | ---        |

### Notes

- franekca.pl.tl  
Sep 22, 2017, 7:02 PM

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