

## #30 Forever Winter Bitter

- Gravity **13.8 BLG**
- ABV **5.7 %**
- IBU **54**
- SRM **9.2**
- Style **Extra Special/Strong Bitter (English Pale Ale)**

### 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 **2.7 liter(s)**
- Total mash volume **3.6 liter(s)**

### Fermentables

| Type           | Name                           | Amount         | Yield | EBC |
|----------------|--------------------------------|----------------|-------|-----|
| Liquid Extract | Bruntal ekstrakt słodowy jasny | 3.4 kg (79.1%) | 81 %  | 26  |
| Grain          | Viking Pilsner malt            | 0.5 kg (11.6%) | 82 %  | 4   |
| Grain          | Carahell                       | 0.25 kg (5.8%) | 77 %  | 26  |
| Grain          | Słód owsiany Fawcett           | 0.15 kg (3.5%) | 61 %  | 5   |

### Hops

| Use for             | Name         | Amount | Time   | Alpha acid |
|---------------------|--------------|--------|--------|------------|
| Boil                | Styrian Wolf | 15 g   | 60 min | 14.9 %     |
| Boil                | Saaz         | 15 g   | 30 min | 3.9 %      |
| Boil                | Cascade PL   | 10 g   | 30 min | 7.5 %      |
| Boil                | Styrian Wolf | 10 g   | 30 min | 14.9 %     |
| Aroma (end of boil) | Cascade PL   | 20 g   | 5 min  | 7.5 %      |
| Aroma (end of boil) | Styrian Wolf | 15 g   | 5 min  | 14.9 %     |

### Yeasts

| Name                       | Type | Form  | Amount | Laboratory       |
|----------------------------|------|-------|--------|------------------|
| FM10 O czym szumią wierzby | Ale  | Slant | 200 ml | Fermentum Mobile |

### Notes

- Warzenie ~9l, reszta uzupełniona wodą w fermentorze.  
*Apr 3, 2022, 8:27 PM*