

# Polski Lager I

- Gravity **12.1 BLG**
- ABV **4.9 %**
- IBU **33**
- SRM **5**
- Style **Premium American Lager**

## Batch size

- Expected quantity of finished beer **10 liter(s)**
- Trub loss **5 %**
- Size with trub loss **10.5 liter(s)**
- Boil time **60 min**
- Evaporation rate **35 %/h**
- Boil size **15.5 liter(s)**

## Mash information

- Mash efficiency **75.1 %**
- Liquor-to-grist ratio **3.5 liter(s) / kg**
- Mash size **8.4 liter(s)**
- Total mash volume **10.8 liter(s)**

## Steps

- Temp **67 C**, Time **60 min**
- Temp **78 C**, Time **0 min**

## Mash step by step

- Heat up **8.4 liter(s)** of strike water to **73.7C**
- Add grains
- Keep mash **60 min** at **67C**
- Keep mash **0 min** at **78C**
- Sparge using **9.5 liter(s)** of **76C** water or to achieve **15.5 liter(s)** of wort

## Fermentables

| Type  | Name                      | Amount         | Yield | EBC |
|-------|---------------------------|----------------|-------|-----|
| Grain | Weyermann - Pilsneński    | 1.6 kg (66.7%) | 80 %  | 4   |
| Grain | Weyermann - Monachijski I | 0.7 kg (29.2%) | 80 %  | 16  |
| Grain | Weyermann - Zakwaszający  | 0.1 kg (4.2%)  | 75 %  | 4   |

## Hops

| Use for | Name     | Amount | Time   | Alpha acid |
|---------|----------|--------|--------|------------|
| Boil    | PL lunga | 5 g    | 60 min | 12.5 %     |
| Boil    | PL lunga | 5 g    | 30 min | 12.5 %     |
| Boil    | PL lunga | 15 g   | 5 min  | 12.5 %     |

## Yeasts

| Name             | Type  | Form  | Amount | Laboratory |
|------------------|-------|-------|--------|------------|
| Saflager W 34/70 | Lager | Slant | 80 ml  | Fermentis  |