

ALE PALE

- Gravity **12.6 BLG**
- ABV **5.1 %**
- IBU **36**
- SRM **9**
- Style **Extra Special/Strong Bitter (English Pale Ale)**

Batch size

- Expected quantity of finished beer **35 liter(s)**
- Trub loss **5 %**
- Size with trub loss **36.8 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **44.3 liter(s)**

Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **26.7 liter(s)**
- Total mash volume **35.6 liter(s)**

Steps

- Temp **67 C**, Time **45 min**
- Temp **72 C**, Time **10 min**
- Temp **76 C**, Time **5 min**

Mash step by step

- Heat up **26.7 liter(s)** of strike water to **74.8C**
- Add grains
- Keep mash **45 min** at **67C**
- Keep mash **10 min** at **72C**
- Keep mash **5 min** at **76C**
- Sparge using **26.5 liter(s)** of **76C** water or to achieve **44.3 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Grain	Briess - Pale Ale Malt	7 kg (78.7%)	80 %	7
Grain	Strzegom Wiedeński	0.6 kg (6.7%)	79 %	10
Grain	Słód Karmelowy Pale Cara	0.5 kg (5.6%)	79 %	9
Grain	Crystal 90	0.5 kg (5.6%)	79 %	90
Grain	Crystal II 200	0.3 kg (3.4%)	79 %	200

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Challenger	50 g	60 min	7 %
Boil	Fuggles	100 g	15 min	4.5 %
Boil	East Kent Goldings	100 g	0 min	5.1 %