

# Extra Special Bitter

- Gravity **15 BLG**
- ABV **6.2 %**
- IBU **37**
- SRM **15.3**
- 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 **18 liter(s)**
- Total mash volume **24 liter(s)**

## Steps

- Temp **62 C**, Time **45 min**
- Temp **72 C**, Time **20 min**

## Mash step by step

- Heat up **18 liter(s)** of strike water to **69C**
- Add grains
- Keep mash **45 min** at **62C**
- Keep mash **20 min** at **72C**
- Sparge using **13.3 liter(s)** of **76C** water or to achieve **25.3 liter(s)** of wort

## Fermentables

Type	Name	Amount	Yield	EBC
Grain	Viking Pale Ale Malt	4 kg (66.7%)	80 %	5
Grain	Strzegom Red Ale	1 kg (16.7%)	80 %	60
Grain	Karmelowy Pszeniczny Strzegom	1 kg (16.7%)	79 %	130

## Hops

Use for	Name	Amount	Time	Alpha acid
Boil	East Kent Goldings	40 g	60 min	5.1 %
Boil	East Kent Goldings	20 g	30 min	5.1 %
Boil	East Kent Goldings	10 g	10 min	5.1 %
Whirlpool	East Kent Goldings	30 g	40 min	5.1 %

## Yeasts

Name	Type	Form	Amount	Laboratory
Gozdawa Original British Ale Yeast Withbread OBAY 04	Ale	Dry	11.5 g	Gozdawa

## Extras

Type	Name	Amount	Use for	Time
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Fining	Mech irlandzki	5 g	Boil	10 min
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