

# Kolsch

- Gravity **9.5 BLG**
- ABV **3.7 %**
- IBU **21**
- SRM **3.1**
- Style **Kölsch**

## Batch size

- Expected quantity of finished beer **23 liter(s)**
- Trub loss **5 %**
- Size with trub loss **24.1 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **29 liter(s)**

## Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **12.9 liter(s)**
- Total mash volume **17.2 liter(s)**

## Steps

- Temp **54 C**, Time **15 min**
- Temp **65 C**, Time **40 min**
- Temp **72 C**, Time **20 min**
- Temp **78 C**, Time **0 min**

## Mash step by step

- Heat up **12.9 liter(s)** of strike water to **59.7C**
- Add grains
- Keep mash **15 min** at **54C**
- Keep mash **40 min** at **65C**
- Keep mash **20 min** at **72C**
- Keep mash **0 min** at **78C**
- Sparge using **20.4 liter(s)** of **76C** water or to achieve **29 liter(s)** of wort

## Fermentables

Type	Name	Amount	Yield	EBC
Grain	Słód Pilsner® 2,5-4,5 EBC Weyermann	3.8 kg (88.4%)	80 %	4
Grain	Weyermann - Pale Wheat Malt	0.25 kg (5.8%)	85 %	5
Grain	Weyermann - Spelt Malt	0.25 kg (5.8%)	81 %	6

## Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Tradition	20 g	60 min	5.5 %
Boil	Tradition	30 g	15 min	5.5 %

## Yeasts

Name	Type	Form	Amount	Laboratory
WLP090 - San Diego Super Yeast	Ale	Liquid	1000 ml	White Labs

## Notes

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

- fermentowanko w 16c przez 2 tyg, lagerowanie przez 3-4 tyg.  
*Jan 28, 2018, 11:57 PM*