Carl

- Gravity 10.7 BLG
- ABV 4.3 %
- IBU **47**
- SRM **3.9**
- Style American Pale Ale

Batch size

- Expected quantity of finished beer 22 liter(s)
- Trub loss 10 %
- Size with trub loss 25.3 liter(s)
- · Boil time 60 min
- Evaporation rate 10 %/h
- Boil size 30.3 liter(s)

Mash information

- Mash efficiency 70 %
- Liquor-to-grist ratio 3 liter(s) / kg Mash size 16.5 liter(s)
- Total mash volume 22 liter(s)

Steps

- Temp 66 C, Time 60 min
 Temp 75 C, Time 20 min

Mash step by step

- Heat up 16.5 liter(s) of strike water to 73.7C
- Add grains
- Keep mash 60 min at 66C
- Keep mash 20 min at 75C
- Sparge using 19.3 liter(s) of 76C water or to achieve 30.3 liter(s) of wort

Fermentables

Туре	Name	Amount	Yield	EBC
Grain	Viking Pale Ale malt	5.5 kg <i>(100%)</i>	80 %	5

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Citra	30 g	60 min	12.8 %
Whirlpool	Citra	20 g	30 min	12.8 %

Yeasts

Name	Туре	Form	Amount	Laboratory
Us-05	Ale	Dry	1 g	