

Wet hop

- Gravity **14.7 BLG**
- ABV **6.1 %**
- IBU **50**
- SRM **4**
- Style **American Pale Ale**

Batch size

- Expected quantity of finished beer **12 liter(s)**
- Trub loss **8 %**
- Size with trub loss **13.9 liter(s)**
- Boil time **60 min**
- Evaporation rate **15 %/h**
- Boil size **20.1 liter(s)**

Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **2.5 liter(s) / kg**
- Mash size **11.3 liter(s)**
- Total mash volume **15.8 liter(s)**

Steps

- Temp **62 C**, Time **60 min**
- Temp **78 C**, Time **1 min**

Mash step by step

- Heat up **11.3 liter(s)** of strike water to **70.4C**
- Add grains
- Keep mash **60 min** at **62C**
- Keep mash **1 min** at **78C**
- Sparge using **13.3 liter(s)** of **76C** water or to achieve **20.1 liter(s)** of wort

Fermentables

| Type | Name | Amount | Yield | EBC |
|-------|--------------|---------------|-------|-----|
| Grain | Pilzneński | 4.05 kg (90%) | 81 % | 4 |
| Grain | Rice, Flaked | 0.45 kg (10%) | 70 % | 2 |

Hops

| Use for | Name | Amount | Time | Alpha acid |
|---------|-----------------|--------|----------|------------|
| Boil | Wet hop | 100 g | 60 min | 1 % |
| Boil | Wet Hop | 100 g | 30 min | 1 % |
| Boil | Wet Hop | 200 g | 20 min | 1 % |
| Boil | Wet Hop | 200 g | 10 min | 1 % |
| Boil | Cascade wet hop | 30 g | 5 min | 1.5 % |
| Dry Hop | Wet Hop | 300 g | 4 day(s) | 1 % |

Yeasts

| Name | Type | Form | Amount | Laboratory |
|--------------------------------|------|-------|--------|------------|
| WLP090 - San Diego Super Yeast | Ale | Slant | 150 ml | White Labs |