

## IPA Ami test

- Gravity **13.1 BLG**
- ABV **5.3 %**
- IBU **31**
- SRM **4.3**
- Style **American IPA**

### Batch size

- Expected quantity of finished beer **15 liter(s)**
- Trub loss **5 %**
- Size with trub loss **15.8 liter(s)**
- Boil time **60 min**
- Evaporation rate **20 %/h**
- Boil size **20.8 liter(s)**

### Mash information

- Mash efficiency **80 %**
- Liquor-to-grist ratio **3.5 liter(s) / kg**
- Mash size **13 liter(s)**
- Total mash volume **16.7 liter(s)**

### Steps

- Temp **66 C**, Time **60 min**
- Temp **76 C**, Time **5 min**

### Mash step by step

- Heat up **13 liter(s)** of strike water to **72.5C**
- Add grains
- Keep mash **60 min** at **66C**
- Keep mash **5 min** at **76C**
- Sparge using **11.5 liter(s)** of **76C** water or to achieve **20.8 liter(s)** of wort

### Fermentables

| Type  | Name               | Amount         | Yield | EBC |
|-------|--------------------|----------------|-------|-----|
| Grain | Pilsner Malz Best  | 2.2 kg (59.5%) | 81 %  | 3   |
| Grain | Münchner Malz Best | 0.4 kg (10.8%) | 78 %  | 20  |
| Grain | Weizenmalz Best    | 0.4 kg (10.8%) | 82 %  | 4   |
| Grain | Oats, Flaked       | 0.5 kg (13.5%) | 80 %  | 2   |
| Grain | Carapils Best      | 0.1 kg (2.7%)  | 75 %  | 5   |
| Grain | Carahell Best      | 0.1 kg (2.7%)  | 75 %  | 30  |

### Hops

| Use for   | Name       | Amount | Time   | Alpha acid |
|-----------|------------|--------|--------|------------|
| Boil      | Simcoe     | 10 g   | 15 min | 12.6 %     |
| Boil      | Galaxy     | 10 g   | 15 min | 15 %       |
| Whirlpool | Centennial | 10 g   | 15 min | 9.5 %      |
| Whirlpool | Amarillo   | 10 g   | 5 min  | 8.7 %      |
| Whirlpool | El Dorado  | 20 g   | 5 min  | 15 %       |
| Whirlpool | Galaxy     | 10 g   | 5 min  | 15 %       |

### Yeasts

| Name | Type | Form | Amount | Laboratory |
|------|------|------|--------|------------|
|------|------|------|--------|------------|

|      |     |       |          |             |
|------|-----|-------|----------|-------------|
| 1056 | Ale | Slant | 88.24 ml | Wyeast Labs |
|------|-----|-------|----------|-------------|

### Extras

| Type        | Name            | Amount | Use for | Time   |
|-------------|-----------------|--------|---------|--------|
| Water Agent | gips piwowarski | 4.41 g | Mash    | 60 min |