

## 2 beer or not 2 beer ddh Ipa i malina ipa

- Gravity **13.1 BLG**
- ABV **5.3 %**
- IBU **13**
- SRM **5.9**
- Style **Fruit Beer**

### Batch size

- Expected quantity of finished beer **15 liter(s)**
- Trub loss **8 %**
- Size with trub loss **16.5 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **19.8 liter(s)**

### Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **12.6 liter(s)**
- Total mash volume **16.8 liter(s)**

### Steps

- Temp **30 C**, Time **10 min**
- Temp **70 C**, Time **60 min**
- Temp **76 C**, Time **1 min**

### Mash step by step

- Heat up **12.6 liter(s)** of strike water to **31.7C**
- Add grains
- Keep mash **10 min** at **30C**
- Keep mash **60 min** at **70C**
- Keep mash **1 min** at **76C**
- Sparge using **11.4 liter(s)** of **76C** water or to achieve **19.8 liter(s)** of wort

### Fermentables

| Type  | Name                         | Amount        | Yield | EBC |
|-------|------------------------------|---------------|-------|-----|
| Grain | Viking Pale Ale malt         | 2 kg (47.6%)  | 80 %  | 5   |
| Grain | Simpsons wheat               | 1 kg (23.8%)  | --- % | --- |
| Grain | Simpsons - Golden Naked Oats | 1 kg (23.8%)  | 73 %  | 20  |
| Grain | Caramel/Crystal Malt - 20L   | 0.2 kg (4.8%) | 75 %  | 39  |

### Hops

| Use for   | Name     | Amount | Time     | Alpha acid |
|-----------|----------|--------|----------|------------|
| Whirlpool | Mosaic   | 10 g   | 60 min   | 10 %       |
| Whirlpool | Amarillo | 10 g   | 60 min   | 9.5 %      |
| Dry Hop   | Citra    | 40 g   | 7 day(s) | 12 %       |

### Yeasts

| Name                              | Type | Form | Amount | Laboratory      |
|-----------------------------------|------|------|--------|-----------------|
| Mangrove Jack's M44 US West Coast | Ale  | Dry  | 10 g   | Mangrove Jack's |

### Extras

| Type   | Name         | Amount | Use for   | Time     |
|--------|--------------|--------|-----------|----------|
| Flavor | Maliny pulpa | 500 g  | Secondary | 7 day(s) |

### Notes

- Jedna WRAKA ale piwo zostanie podzielone na dwa fermentory. Pierwsze będzie ddh ipa a drugie ipa z malinami  
*Jun 19, 2019, 5:03 PM*