

BRETT IPA #32

- Gravity **14.3 BLG**
- ABV ---
- IBU **54**
- SRM **5.5**
- Style **American IPA**

Batch size

- Expected quantity of finished beer **18 liter(s)**
- Trub loss **5 %**
- Size with trub loss **19.4 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **22.3 liter(s)**

Mash information

- Mash efficiency **75.2 %**
- Liquor-to-grist ratio **3.5 liter(s) / kg**
- Mash size **16.4 liter(s)**
- Total mash volume **21.1 liter(s)**

Steps

- Temp **67 C**, Time **60 min**
- Temp **76 C**, Time **5 min**

Mash step by step

- Heat up **16.4 liter(s)** of strike water to **73.7C**
- Add grains
- Keep mash **60 min** at **67C**
- Keep mash **5 min** at **76C**
- Sparge using **10.6 liter(s)** of **76C** water or to achieve **22.3 liter(s)** of wort

Fermentables

| Type | Name | Amount | Yield | EBC |
|-------|----------------------------|----------------|-------|-----|
| Grain | Bruntal - pilzneński | 3.2 kg (68.1%) | 81 % | 4 |
| Grain | Chateau - pszeniczny jasny | 1.1 kg (23.4%) | 83 % | 4.5 |
| Grain | Viking - Rye Malt | 0.2 kg (4.3%) | 81 % | 8 |
| Grain | Chateau - Crystal | 0.1 kg (2.1%) | 78 % | 150 |
| Grain | Bestmalz - Caramelpils | 0.1 kg (2.1%) | 75 % | 5 |

Hops

| Use for | Name | Amount | Time | Alpha acid |
|---------------------|------------|--------|----------|------------|
| Boil | Topaz | 5 g | 60 min | 15.5 % |
| Boil | Centennial | 10 g | 20 min | 8.5 % |
| Boil | Citra | 10 g | 20 min | 12 % |
| Boil | Mosaic | 10 g | 20 min | 11.7 % |
| Aroma (end of boil) | Cascade | 20 g | 7 min | 7.7 % |
| Aroma (end of boil) | Citra | 15 g | 7 min | 12 % |
| Aroma (end of boil) | Centennial | 10 g | 7 min | 8.5 % |
| Aroma (end of boil) | Galaxy | 15 g | 7 min | 14.5 % |
| Dry Hop | Mosaic | 20 g | 5 day(s) | 11.7 % |

| | | | | |
|---------|------------|------|----------|--------|
| Dry Hop | Centennial | 20 g | 5 day(s) | 8.5 % |
| Dry Hop | Galaxy | 15 g | 5 day(s) | 14.5 % |
| Dry Hop | Cascade | 20 g | 5 day(s) | 7.7 % |
| Dry Hop | Citra | 5 g | 5 day(s) | 12 % |
| Dry Hop | Centennial | 10 g | 2 day(s) | 8.5 % |
| Dry Hop | Galaxy | 10 g | 2 day(s) | 14.5 % |
| Dry Hop | Cascade | 10 g | 2 day(s) | 7.7 % |

Yeasts

| Name | Type | Form | Amount | Laboratory |
|--------------------------------|------|--------|--------|------------|
| Amalgamation Brett Super Blend | Ale | Liquid | 400 ml | White Labs |

Extras

| Type | Name | Amount | Use for | Time |
|-------------|------------------|--------|---------|-------|
| Water Agent | Gips | 6.5 g | Mash | --- |
| Fining | irish moss | 3 g | Boil | 7 min |
| Water Agent | kwas mlekowy 80% | 5 g | Mash | --- |

Notes

- 1. zrobić starter drożdżowy 2stopniowy (2x6-7 dni) (1L+1,2L)
 - 2. planowana fermentacja: burzliwa ok. 26-30 dni, cicha ok. 7 dni
- Dec 12, 2016, 5:37 PM*