

Bio-Oz Sourdough Khorasan Bread

1.0 21.10.2017
2.0 28.11.2017

Ingredients – Sourdough Activation

Ingredient	Qty
Sourdough starter 100% hydration (1:1 water/flour)	50-100g
Bio-Oz White Khorasan flour	100-200g
Bio-Oz Whole Khorasan flour	100-200g
Filtered water, 26°C	200-400g

Ingredients – Bread

Ingredient	Bakers %	1x (g)	2x (g)	3x (g)	4x (g)
Activated sourdough starter 100% hydration (1:1 water/flour)	12.2	75	150 (150)	225	300
Bio-Oz White Khorasan flour	62.9	385	770 (920)	1155	1540
Bio-Oz Whole Khorasan flour	31.0	190	380 (1300)	570	760
Water, 26°C	58.8	360	720 (2020)	1080	1440
Additional water, 26°C	4.1	25	50 (2070)	75	100
Salt	1.2	7.5	15 (2085)	22.5	30
Product total		1042.5	2085	3127.5	4170
Cooked product total		905g	1810g	2715g	3620g

Baking

Oven temperature	250°C, 230°C
Baking time	20, 13mins

Comments:

Use a Dutch oven to bake the loaves

This method is based on the Tartine Country Loaf.

A good video to watch is <https://www.youtube.com/watch?v=30CLbYT7Ruk>

Method

Activate starter

In this step, you

- Prepare the starter for the bake
- Make a new batch of starter for later use
- Check that the starter is viable

Measure out a quantity of the stored starter to be used in the upcoming bake (plus at least 50g more) and allow it to become active. When it's active you will notice lots of bubbles forming on the surface. The quantity

measured out should be enough for the bake you are about to do, plus some additional starter to make a new batch of starter for later use.

There are 2 ways of doing this. If your starter is quite young, say less than 7 days and has been stored in the fridge for that time, (1) simply measure out the required amount for the loaf plus some extra for the new starter. If the starter is older, (2) you will need to revitalize it by adding flour and water.

For (1), where the starter is less than 7 days and has been kept in the fridge, skip steps 3 – 6. If the starter needs re-vitalising, then do steps 3-6.

If there are no bubbles after 12 hours, then the starter is not active and you cannot bake with it.

Once the starter is activated after about 10 – 12 hours, you then measure out the quantity required for the bake and then make the new batch of starter with the remaining activated starter.

Feed the starter at least once a week if stored in the fridge. Before feeding the starter, discard half the stored starter. You should activate the starter (and revitalize it if necessary) before making the new batch. Follow all the steps, above, making the same decisions, using only enough to be stored.

Step	Step description	Elapsed Time hh:mm	Effort hh:mm
1.	Obtain bowls, prepare work area	0:05	0:05
2.	Measure the sourdough starter into a ceramic bowl.	0:02	0:02
3.	Revitalise the starter: Measure out equal quantities of white flour and whole Khorasan four, enough for the next bake. For example, 75g each for a single loaf, 100g for 2 loaves etc. Don't add the flour to the starter yet.	0:02	0:02
4.	Measure out the same weight of 26°C filtered water as the weight of the total flour measured out in the previous step. Eg: 100g WW, 100g White, 200g water.	0:02	0:02
5.	Add the water to the sourdough starter and mix until incorporated.	0:02	0:02
6.	Add the whole and white flour to the water/starter, and mix until the water and flour has been combined.	0:03	0:03
7.	Activate: Cover the bowl with cling wrap and wait for the mixture to form a mass of bubbles. This can take up to 12 hours.	12:00	0:02
8.	Once it reaches this active stage with lots of bubbles on the surface, measure out the required amount for the bread (see <i>Method – bread making</i> below).	0:02	0:02
9.	Make new starter: Place at least 50g (or more) of the remaining sourdough in a bowl	0:01	0:01
10.	To the bowl containing the 50g or more activated sourdough starter, add 50g white flour, 50g whole flour, 100g filtered water, and mix**. Place the mixture into a clean plastic container. If you are re-using the same plastic container, wash and dry the container first before pouring in the starter. It's important to use a clean container to avoid the growth of unwanted bacteria. Place the container into the fridge. The amounts used here depends on your next bake. The rule is starter + x grams WW flour + x grams of White flour + 2x grams of water. The amount of starter is not really significant but as a guide use at least .5x grams of starter.	0:07	0:07
11.	Discard or pass on to a friend any starter which is not being used for the bread and is not stored in the plastic container.	0:02	0:02
	Total	12:28	0:30

Bread making

Sourdough yeasts and bacteria are most active at about 26°C. A simple way of keeping the dough warm is to place the mixing bowl into a sink of water at a couple of degrees above this temperature: Fill a sink up the level of half way up the mixing bowl with 28°C water. Place the bowl in this water. Remove the bowl before each step, then adjust the temperature of the water before replacing the bowl.

Step	Step description	Elapsed Time hh:mm	Effort hh:mm
1.	Obtain the bowls, prepare work area	0:02	0:2
2.	Initial Mix: Measure the activated sourdough starter required for the bake into a mixing bowl	0:01	0:01
3.	Add the water and mix until incorporated.	0:03	0:03
4.	Measure out white and whole Khorasan flour and add to the water/sourdough mix	0:03	0:03
5.	Mix together until all the flour is just hydrated	0:03	0:03
6.	Autolyze: Cover and leave to rest for 60 minutes.	1:03	0:03
7.	Salting: In a separate small bowl, pour in the "Additional water". Add the salt to the additional water and mix. The salt will not fully dissolve. Pour the salt water and any undissolved grains of salt to the dough mixture Squish together the salt, salty water and dough mixture until incorporated	0:07	0:07
8.	Bulk ferment: Rest for about 4 hours** at 26°C covered. Every half hour, put your hand down the side of the dough, lift up from the bottom and fold over itself. Make a quarter turn of the bowl and repeat for 4 quarter turns. This is one turn. Make 3 turns.	4:00	0:40
9.	Bench rest: Once the dough becomes "puffy"***, remove the dough from the bowl. Divide into loaves. Stretch each side of the dough and fold back on itself. After the last fold, form a round. Leave for 30minutes covered on the bench.	0:35	0:05
10.	Shaping: Stretch and fold each loaf. Shape the dough into boules (round loaves) ensuring the surface is stretched. Place into bannetons, top side down (seam side up).	0:06	0:06
11.	Place a Dutch oven into the oven and heat the oven to 250°C	0:01	0:01
12.	Final rise: Cover the dough and let it rise until it is about 50-100% greater in volume	4:00	0:01
13.	Baking: Remove the hot Dutch oven from the oven when the oven reaches 250°C. Upturn the dough loaf from the banneton into the heated Dutch. Score the top of the loaf, with no more than .5cm slashes. Replace the lid on the Dutch oven. Put the Dutch oven back in the oven. Turn the oven down to 230°C. Bake for 20 mins	0:20	0:05
14.	Remove the cover from the Dutch oven. Continue baking with the lid off for 13 mins at 230°C.	0:13	0:05
	Total	10:37	1:25

** The dough will begin to rise in the mixing bowl and become puffy at some stage during the bulk ferment. On a hot day, this will happen sooner than on a cold day. If you are using the sink to manage the temperature, or on a warm day, it will happen close to the 4-hour mark. As soon as you notice this puffiness, go to the next step (Bench Rest).