

GOOD REASONS FOR

PURE & PRODUCTIVE FLUXES

# KEY FEATURES

## Quantifiable Pure Products

- Lithium Borate
- Internal Standard
- Fully Integrated Additives

## Prior Preparation – Ready for Fusion

Open the flux vial, place upon the analytical balance adding the sample weight, recap and shake to mix.

## X-Ray Flux

### Type 66:34

(Fine Grind, approx. 25% <100µ)

66.0% Lithium Tetraborate  
34.0% Lithium Metaborate

#### Additions

20.0% Sodium Nitrate

#### General Specifications

0-1 ppm Pb, Ni, Mn, Cd, Zn, Co, Ag  
1-5 ppm K, Cu, Se, As, Al, Sn, Na, Fe  
2-10 ppm Si, S, Ca, Mg

Average melting temperature 875°C

Batch: 241011E 2kg

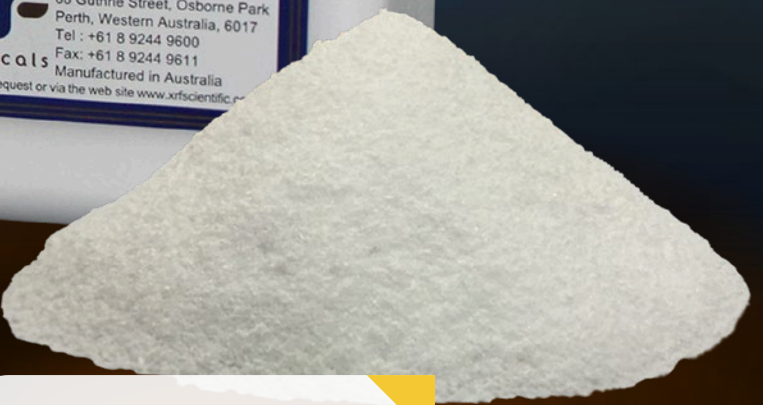
**XRF**  
chemicals

XRF Chemicals Pty Ltd  
88 Guthrie Street, Osborne Park  
Perth, Western Australia, 6017  
Tel : +61 8 9244 9600  
Fax: +61 8 9244 9611  
Manufactured in Australia

MSDS available on request or via the web site [www.xrfscientific.com](http://www.xrfscientific.com)

## Pre-weighed Plastic Vials

- Pre-weighed flux vials provide the laboratory with a clean & efficient way for sample.
- Store in rack ready to use preparation.



## Available Material Structure

- granular
- beaded (spherical)



## Immediate Use

Open the pre-weighed flux vial, pour directly into the crucible and add the corresponding sample weight.

## Couldn't find the perfect match ...?

Just contact us and we find the matching product together. We manufacture custom-made products exactly to your specification. Or our application chemists will help you develop and implement the needed solution.

## Standard Flux Types

Standard Fluxes without additives	Granular		Micro Beads
	Standard 2kg Poly Jar	1 kg Poly Jar*	1 kg Poly Jar
LT-100 (Lithium Tetraborate 100%)	1020100	1020100KG	1020100MB
66:34 (LiT 66.0% : LiM 34.0%)	1013800	1013800KG	1013800MB
50:50 (LiT 50.0% : LiM 50.0%)	1007300	1007300KG	1007300MB
12:22 (LiT 35.3% : LiM 64.7%)	1003200	1003200KG	1003200MB
LM-100 (Lithium Metaborate 100%)	1017800	1017800KG	1017800MB

Fluxes plus release (non wetting) agent Lithium Bromide (LiBr)	Granular		Micro Beads
	Standard 2kg Poly Jar	1kg Poly Jar*	1kg Poly Jar
LT-100 (Lithium Tetraborate 100%) + 0.5% LiBr	1019200	1019200KG	1019200MB
66:34 (LiT 66.0% : LiM 34.0%) + 0.5% LiBr	1012500	1012500KG	1012500MB
50:50 (LiT 50.0% : LiM 50.0%) + 0.5% LiBr	1008500	1018500KG	1008500MB
12:22 (LiT 35.3% : LiM 64.7%) + 0.5% LiBr	1001300	1001300KG	1001300MB
LM-100 (Lithium Metaborate 100%) 0.5%LiBr	1017820	1017820KG	1017820MB

Fluxes plus release (non wetting) agent Lithium Iodide (LiI)	Granular		Micro Beads
	Standard 2kg Poly Jar	1kg Poly Jar*	1kg Poly Jar
LT-100 (Lithium Tetraborate 100%) + 0.5% LiI	1019300	*	*
66:34 (LiT 66.0% : LiM 34.0%) + 0.5% LiI	1012600	*	*
50:50 (LiT 50.0% : LiM 50.0%) + 0.5% LiI	1008600	*	*
12:22 (LiT 34.3% : LiM 64.7%) + 0.5% LiI	1001400	*	*
LM-100 (Lithium Metaborate 100%) +0.5%LiI	1017825	*	*

## Mold Release Agents

Release Agents / Non-Wetting Agents (NWA)	Size	
Lithium Bromide Assay >99.5%min	1016700	1kg Poly Jar
Ammonium Iodide anhydrous Powder >99.5% min	1016400	500g Poly jar
Ammonium Iodide tablets	1016500	1500 tablets per Jar

Notes:

\* 1 kg Poly Jar available upon request

Many other custom formulations available on request

## Standard Flux Plus: Oxidisers & / or Non Wetting Agents (NWA)

Lithium Nitrate (LiNO <sub>3</sub> ) Fluxes	Granular		Micro Beads
	Standard 2kg Poly Jar	1kg Poly Jar*	1kg Poly Jar
LT100 Granular + 5.0% Lithium Nitrate	1022005	*	*
12:22 Fine Grind + 4.0% Lithium Nitrate	1005800	*	*
12:22 Fine Grind + 5.0% Lithium Nitrate	1005900	*	*
12:22 Granular + 10.0% Lithium Nitrate	1001800	*	*
12:22 Granular + 2.0% Lithium Nitrate	1002200	*	*
12:22 Granular + 4.0% Lithium Nitrate	1002500	*	*
12:22 Granular + 4.0% Lithium Nitrate + 0.5% Lithium Bromide	1002510	*	*
50:50 Granular + 10.0% Lithium Nitrate	1010450	*	*
66:34 Fine Grind + 4.0% Lithium Nitrate	1015300	*	*

Sodium Nitrate (NaNO <sub>3</sub> ) Fluxes	Granular		Micro Beads
	Standard 2kg Poly Jar	1kg Poly Jar*	1kg Poly Jar
12:22 Fine Grind + 12.82% Sodium Nitrate	1005400	*	*
12:22 Fine Grind + 20.0 % Sodium Nitrate	1005700	*	*
12:22 Fine Grind + 20.0 % Sodium Nitrate + 0.025% Lithium Bromide	1006200	*	*
12:22 Fine Grind + 5.0% Sodium Nitrate	1006000	*	*
12:22 Granular + 10.0% Sodium Nitrate	1001900	*	*
12:22 Granular + 12.82% Sodium Nitrate	1002000	*	*
12:22 Granular + 15.0% Sodium Nitrate	1002100	*	*
12:22 Granular + 20.0% Sodium Nitrate	1002400	*	*
12:22 Granular + 5.0% Sodium Nitrate	1002700	*	*
12:22 Granular + 12.82% Sodium Nitrate + 0.5% Lithium Bromide	1002010	*	*
50:50 Granular + 12.82% Sodium Nitrate + 0.5% Lithium Bromide	1008850	*	*
66:34 Fine Grind + 20.0% Sodium Nitrate	1015200	*	*
66:34 Granular + 12.82% Sodium Nitrate + 0.5% Lithium Bromide	1013200	*	*

## Miscellaneous

Silicon Dioxide (SiO <sub>2</sub> , granular 75-150 μ), assay 99.99% min.	1 kg Poly Jar	1016900
Synthetic Iron Ore Calibration Standard	100g Jar	1017300

Notes:

\* 1 kg Poly Jar available upon request

Many other custom formulations available on request

- Subject to changes and errors excepted.



# OVERVIEW

From raw material through to final product our flux uniquely provides the modern laboratory with a quality that enables elemental analysis with limited background interference.

The source of our raw material is monitored and provides the basis to consistent and quantitative results.

Our product range delivers you with choice, across the various ratios of Lithium Tetraborate and Lithium Metaborate in both **granular** and **beaded (spherical)** form.

**XRF Fluxes are non-hygroscopic vitreous particles** across both product forms either granular or beaded (spherical). With a density level to ensure the flux in the crucible does not exceed more than 50% capacity and **a consistent low LOI (water content <0.04%)** that will maintain the sample:flux ratio in line with good analytical results.

All XRF Fluxes are **fully analysed and documented across 20 relevant elements** providing you, the analyst, with the reassurance of not having to necessarily re-calibrate the spectrometer with each delivery/batch.

**Integrated additives** such as  $\text{LiNO}_3$  and  $\text{NaNO}_3$  support the oxidization consistently and thoroughly. These compounds may be combined with LiI or LiBr as a release / non-wetting agent (NWA) to maintain dependable quantitative results.

The end user can be assured that no matter which formulation is used, either with or without additives, the basis to your best practice analytical process will remain constant.

**Our stock holdings** are maintained at a level to **eliminate delays in supply**, providing you with the comfort and continuity of production.

XRF Scientific Ltd is the World's pre-eminent manufacturer of **quality, cost effective, borate fluxes**. We can provide standard borate fluxes or custom blends to meet your specific needs.



## Weighing

The XrWeigh machines allow the rapid and accurate measurement of flux.

- Problem-free sample preparation
- Simple individual flux weighing

- Increasing laboratory throughput and process repeatability
- Inclusion of auto-sample ratio calculation
- Pre-weigh 30 vials in 20 minutes



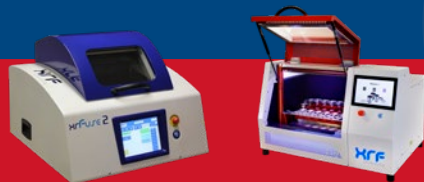
## Fusion Machines

We manufacture fully automated electric or gas operated fusion machines. Safe, easy and reliable to operate and suitable for various numbers of samples handled per day.



## Labware

We manufacture labware for all our fusion instruments in house. We can also provide a remake service for the transfer from other labware designs.



**SALES AUSTRALIA**

**XRF Technology (WA) Pty Ltd**

88 Guthrie Street, Osborn Park  
Western Australia, 6017 Australia

P: +61 (0) 8 9244 9600

F: +61 (0) 8 9244 9611

E: sales@xrfscientific.com

**SALES EUROPE**

**XRF Scientific Europe SPRL**

Avenue de Roodebeek 282  
1030 Schaerbeek, Belgium

P: +32 (0) 2 762 77 12

F: +32 (0) 2 762 55 07

E: info.eu@xrfscientific.com

**XRF Scientific Europe GmbH**

Seligenstädter Str. 100  
63791 Karlstein, Germany

P: +49 (0) 6188 954 2761

F: +49 (0) 6188 954 2799

E: stefan.lang@xrfscientific.com



**CORPORATE OFFICE**

**XRF Scientific LTD**

86 Guthrie Street  
Osborne Park WA 6017, Australia

P: +61 (0) 8 9244 0600

F: +61 (0) 8 9244 9611

E: info@xrfscientific.com

For further salespoints please  
check our website

[www.xrfscientific.com](http://www.xrfscientific.com)