

# Operation Instruction

1. Switch on power, computer, printer and analyzer in sequence.
2. Run S3200 application program to enter main interface. It will start to heat furnace. Click **Setting** and check if parameters are correct.
3. Prepare electrolyte according to the manual.
4. Weigh samples( $50\pm 2\text{mg}$ )(including two waste sample which are high sulfur content of sample) and cover a thin layer of  $\text{WO}_3$  on the each sample after weighing in temperature rise period (about 30min)
5. When furnace is heating, start **Pump/Stir** and take out the clips from the tube connected with electrolyte in/outlet. pump about 250ml electrolyte through the where (Do not overfill. Generally, electrolyte is 2-3cm higher than electrodes). Clamp electrolyte in/outlet .Adjust flow meter to 1000ml/min.
6. Turn off filter switch to check the gas leaking of the gas system according to the instruction manual.
7. When furnace temperature rises to  $1150^\circ\text{C}$ , keep for 0.5h. Before sample analysis, perform one or two analyses for waste samples. During measurement, put combustion boat loaded with samples into quartz boat on sample pusher. Input the related sample weight and moisture content, click start analysis.

8. When the analysis ends, stop **Pump/Stir** and drain electrolyte by taking out the block between electrolytic cell and reagent tubes. Replace the block after draining. Start **Pump/Stir** to pump in distilled water for cleaning electrolytic cell. Drain water after cleaning.
9. Turn off **Pump/Stir** and turn on switch between electrolytic cell and filter pipes. Release electrolyte and turn off switch between electrolytic cell and filter pipes. Pump in distilled water. Start **Pump/Stir** to clean electrolytic cell and release water.
10. Clean coal or dust dropped on analyzer, computer and printer.
11. Switch off analyzer, printer, computer and main power switch in sequence.