This poster presentation shows ideas for making data-logging activities with sensors fun for young children. The approach makes use of iLOG Junior data-logging software which has been designed with the needs of complete novices in mind. The target audience is mainly in primary schools where there are often parent volunteer helpers and children who have no previous experience of data-logging. The user interface aims to give intuitive access to the program facilities, allowing simple experiments to be performed. The built-in library of resources contains demonstration videos, set-up files with on-screen instructions for the experiments, sample results ready for analysis, a virtual logging facility simulating the collection of data from sensors, and a range of animated cartoons which may be controlled by sensors or by reading data from graphs. The cartoon characters are a valuable stimulus for engaging the interest of young children; in order to control the animations, children are enticed to use sensors or graphs.