

1. Introduction to the *Database*

This volume presents and describes Version 2.0 of the “*Database of Potential Sources for Earthquakes Larger than M 5.5 in Italy*” (also referred to as DISS, the acronym of the short form *Database of Italy's Seismogenic Sources*, or simply as *Database*), that was initially conceived at the Istituto Nazionale di Geofisica e Vulcanologia of Rome (INGV; former Istituto Nazionale di Geofisica) in 1996. Aware of the potential of a such a database for seismic hazard assessment in any seismic-prone country, in 1997 we extended the Italian experience to the southern European region by interacting with foreign scientists in the identification and detailed characterisation of faults of Greece, Spain and France. Along with several other European seismologists we launched a project denominated FAUST (FAULTs as a Seismologists' Tool), that was eventually funded by the European Union for three years (see <http://faust.ingv.it/> for a summary of the project's main accomplishments and for browsing the European database). Since then the national and the European projects developed alongside and in July 2000 the structure and the data of Italian database reached a critical level that prompted its first official presentation to the Italian scientific community (20-21 July 2000, Version 1.0). A prototype of the entire *Database* and associated software was distributed on a CD-ROM within the INGV between July and December 2000. Finally, in February 2001 a new EU-funded project termed SAFE (Slow Active Faults in Europe: <http://safe.free.fr/>) has taken on the challenge of extending some of the concepts developed for the DISS to the less seismic but more problematic rest of Europe.

During over five years many workers participated in the construction of the *Database* with different roles and contributions. The first three years were largely devoted to developing the software with relatively few individuals involved, while most of the specific information was collected between 1998 and 2000 based on the work of over a dozen of *data-hunters*. The list includes geologists who contributed original data; geologists who compiled *Database* records based on existing literature; geologists and technicians that shaped up the structure of the *Database* and prepared the text and graphic material to be entered in it; and software engineers who interacted endlessly with all the rest of the group to devise the fundamental structure of the *Database*, prepare and fine-tune the many tools and functions available to the users, and provide some of the non-geological data tables.

[Appendix I](#) lists all Seismogenic Sources that comprise the *Database* (see the following sections for a description of the different source types) and gives credit to all of the respective compilers. We would like to use this opportunity to thank all of them for a difficult, time-consuming, and not immediately rewarding effort. The project also benefited from computer resources and funding from the ING of Rome. For these opportunities we wish to thank Professor Enzo Boschi, who has encouraged and supported this project during its entire duration.

The following chapters describe the structure of the *Database* and of the specific software that governs it ([Chapter 2](#)), its main tools, commands and procedures along with practical examples ([Chapter 3](#)), and the procedure for extending and updating it ([Chapter 4](#)). Please refer to the [Table of Contents](#) for details on where to find what you are looking for. For any further inquiry please visit the web-page of INGV (<http://www.ingv.it/~wwwpaleo/catalogosorgenti/>) and do not hesitate to contact any of the authors.