

## **Short background note on the draft Human DNA Profiling Bill**

(to be read along with other explanation on the Bill provided in the Record Note of the meeting held on 31.1.2013 and in Dr. Gowrishankar's slide presentation on that day)

### **Background:**

The genesis of the Human DNA Profiling Bill can be traced to the Conference called "Impact of New Biology on Justice Delivery System" held at Hyderabad attended by Judges of the Supreme Court and High Courts, scientists, legal academics, which led to the **"Hyderabad Declaration 2003"**.

Recognizing the need to create an appropriate legislation to regulate various issues relating to human DNA profiling and establishment of DNA Data Bank, Department of Biotechnology (DBT), Ministry of Science and Technology with approval of Cabinet, had set up a DNA Profiling Advisory Committee (D-PAC) in December 2003 to make recommendations for enacting suitable legislation. The D-PAC prepared and submitted its report and a preliminary draft of the Human DNA Profiling Bill in 2006, through work of three sub-committees: viz., Legal issues, Quality Control and Quality Assurance issues and Ethical & Social issues. The draft Bill was formulated based on existing laws of other countries (USA, UK, Australia, Canada, etc). Subsequently, the draft Bill was further vetted in detail by a second Committee (during the period 2006-08).

The draft Bill was then put up on the DBT website for public comments and as part of the inter-ministerial consultation, the Draft Bill was circulated to eighteen concerned Ministries and Departments and their comments were obtained and the comments from them were responded to. The draft Bill has since been revised, wherever necessary, keeping these comments in view during the period 2008-09. The draft Bill has since been finalized after discussions with and feedback from different stakeholders. The language of the draft Bill has also been scrutinized and finalized by officials of the Legislative Department, Ministry of Law and Justice (2010).

### **Need for the Bill** (as stated in the note approved by the Union Cabinet in 2003)

1. The genetic material or DNA is like a set of instructions or blueprint of all living forms, inherited by every individual in equal part from each of the parents. The DNA blueprint varies from one individual to another, and yet bears similarity between blood relations; these features permit its use as a means of identification and for establishment of biological relationships between individuals.
2. Today, DNA technology has the potential of wide application in the justice delivery systems both criminal (for example, investigations of violent crimes such as rape and murder), and civil (for example, in paternity or immigration cases and in identification of victims of disasters like cyclones, air crash, etc).

3. It is known that a number of violent crimes are committed by repeat offenders, whose apprehension and conviction will be aided by comparison of biological evidence at the scene of crime with DNA profiles stored in a DNA Data Bank established by law.
4. At the same time, the DNA analysis offers substantial information which if misused or improperly used, can cause harm to individuals or society. There is, thus, need to regulate the use of human DNA profiles through enactment of Law by the Parliament, so that such use is restricted to lawful purposes of establishing identity in a criminal or civil proceedings and for other specified purposes.
5. For these purposes, there will be need for establishing standards both for laboratories, and for procedures to undertake human DNA profiling, and a National DNA Data Bank with policies of use.

### **Expected Benefits**

- DNA profiling data represent infallible and unique scientific evidence which can be used as means of identification of biological specimens, disaster victims, establishment of relatedness, solving criminal cases and issues involved in migration. Hence, the proposed Bill will empower the criminal justice delivery system by enabling the application of DNA evidence, with strict criteria for quality assurance as well as confidentiality in criminal and civil investigations.
- The proposed Bill envisages establishment of the Data Bank of human DNA profiles of offenders and suspects as well as from scenes of crimes, which will assist in forensic investigations and the apprehension of repeat offenders.
- The proposed Bill will provide an opportunity for previously convicted individuals to seek DNA testing to establish their innocence.

### **Salient features of the Bill**

1. The objectives of the Human DNA Profiling Bill, which consists of eleven chapters and one schedule, are to establish a National DNA Data Bank, a DNA Profiling Board (DPB) and the use of DNA profiles for specified purposes and for matters connected therewith or incidental thereto.
2. The DPB would consist of persons having experience in DNA profiling including experts in molecular biology, human genetics, population biology, bioethics, social sciences, law and criminal justice, etc. Its Secretariat is proposed to be at the Centre for DNA Fingerprinting and Diagnostics (CDFD),

Hyderabad, whose Director shall be the ex-officio Member-Secretary of the DPB.

3. The DPB Secretariat would have a Chief Executive Officer (CEO) who would be responsible for executive supervision of its day-to-day activities. The Central Government would provide the required funds for functioning of the DPB, including maintenance and operation of the Secretariat.
4. The DPB shall have the following powers and functions *inter alia*:
  - (a) Define, establish, and modify standards and to implement quality control measures including compulsory accreditation of laboratories/agencies undertaking DNA Profiling services
  - (b) Prevent abuse/misuse of DNA profiling to discriminate against individuals for employment, health/life insurance, etc
  - (c) Authorize communication of DNA profiles to National law enforcement agencies and other agencies for civil proceedings and crime investigation
  - (d) Recommend privacy protection statutes relating to access to, or use of stored DNA samples or DNA analyses
  - (e) Recommend on the appropriate use and confidentiality of DNA information, and the timely removal of expunged or inaccurate DNA information
  - (f) Lay down standards and procedures for establishment and functioning of DNA Data Banks, manpower and infrastructure and other related issues
  - (g) Define, implement and arbitrate on all Ethical and Human Rights issues emanating out of DNA profiling in consonance with International guidelines laid by the United Nations Organization and its specialized agencies.
5. The Bill provides an authority to create and maintain databases, administered by a National DNA Database Manager, for detection of, and to serve as deterrents against, repeat offenders. The National DNA Data Bank shall maintain following indices for various categories of data, namely:-
  - (a) a crime scene index;
  - (b) a suspects' index;
  - (c) an offenders' index;
  - (d) a missing persons' index;
  - (e) unknown deceased persons' index;
  - (f) a volunteers' index; and
  - (g) such other DNA indices as may be specified by regulations made by the Board.

The above indices can be broadly classified into three categories:

- (a) **DNA profiles to be collected only with informed consent:** includes the volunteers' index, which is absolutely essential to calculate the statistical probability values that would be needed in judicial fora to

establish that the match obtained between two DNA profiles is not by chance alone. To calculate these values, a one-time exercise is required to obtain (with informed consent) the DNA profiles of about 100 random individuals from each of the different communities in India to be stored in the National DNA Data Bank after anonymising the data and ensuring that they contain no personally identifiable information nor do they violate ethical norms.

- (b) **DNA profiles to collected without consent but only with judicial order**: includes the suspects' index.
- (c) **DNA profiles to be collected without consent and without a separate judicial order**: includes the offenders' index, crime scene index, and deceased individuals in the unknown deceased persons' index. The offenders' index is essential for apprehending the repeat offenders (for recidivistic crimes).

The DNA profile information in the Data Banks itself has very little scope of being misused since it can only establish identity and/or biological relationship, with no intrinsic value for determining traits of an individual.

6. The Bill provides procedure for grant of approval/accreditation to the DNA laboratories.
7. The Bill provides penalties for unauthorized use of DNA profiling and forensic material.
8. The DPB shall have the power to make Regulations to govern and regulate its own functioning and to carry out the various purposes of the proposed legislation.
9. The Central Government shall have the power to frame Rules for achieving the objectives and carrying out the purposes of the proposed legislation.
10. In summary, the draft DNA Profiling Bill seeks to cover two broad activities, namely, (i) the *process* of DNA profiling and its regulation, for both criminal and civil cases; and (ii) Data Bank of DNA profiles, whose collection shall be only with consent for civil investigations and statistical purposes, but without consent for criminal investigation purposes.