Research & Human Subject Definition

Purpose

This policy defines those activities that constitute human subject research and clinical investigations and fall under the jurisdiction of the Institutional Review Board.

Policy

Boston Children's Hospital defines human subject research as: Any activity that either represents **research** that involves **human subjects** as those terms are defined by Department of Health and Human Services regulations or any activity that represents research/clinical investigation that involves **human subjects** as those terms are defined by Food and Drug Administration (FDA) regulations.

For drugs, the FDA regulations also apply when there is any use of a drug in research except the use of a marketed drug in the course of medical practice.

For devices, FDA regulations apply to studies where the purpose is to determine the safety or effectiveness of a device or data will be submitted to or held for inspection by the FDA as part of a marketing permit. The FDA definition of a human subject includes an individual on whose specimen a medical device will be used if the previously mentioned criteria were met.

Human subject research that is conducted by the **Work Force** of Boston Children's Hospital on its premises or under its sponsorship, whether supported by outside funds or not, is to be reviewed and approved by the Institutional Review Board (IRB). For additional information on the BCH **Work Force**, see IRB Policy: ***IRB Jurisdiction***.

Activities that meet either of the definitions of research below, are subject to review by the Institutional Review Board.

Procedure

The IRB uses the following definitions to determine what constitutes human subject research:

Department of Health and Human Services Common Rule Definitions:

Research: A **systematic investigation**, including research development, testing, and evaluation, designed to develop or contribute to **generalizable knowledge** [45 CFR 46.102(l)]. Activities that meet this definition constitute research, whether they are conducted or supported under a program which is considered research for other purposes or not. For example, some demonstration and service programs may include research activities.

- **Systematic Investigation:** A study following a methodical plan to establish factual information concerning the truth of a specific hypothesis or theory.
- **Generalizable:** Knowledge that may be justifiably transferred or extrapolated to a broader population or situation than that in which it has been derived.

Human Subject: A living individual about whom an investigator conducting research:

1. Obtains information or biospecimens through **intervention** or **interaction** with the individual, and uses, studies, or analyzes the information or biospecimens; or
2. Obtains, uses, studies, analyzes, or generates **identifiable private information** or **identifiable biospecimens**.

Intervention: Includes both physical procedures by which information or biospecimens are gathered (e.g., venipuncture) and manipulations of the subject or the subject's environment that are performed for research purposes.

Interaction: Includes communication or interpersonal contact between investigator and subject.

Private Information: Includes information about behavior that occurs in a context in which an individual can reasonably expect that no observation or recording is taking place, and information that has been provided for specific purposes by an individual and that the individual can reasonably expect will not be made public (e.g., a medical record).

Identifiable private information: Private information for which the identity of the subject is or may readily be ascertained by the investigator or associated with the information.

***Identifiable biospecimen**: A biospecimen for which the identity of the subject is or may readily be ascertained by the investigator or associated with the biospecimen.

*46.102 (7) Per the Federal departments or agencies implementing this policy shall:

(i) Upon consultation with appropriate experts (including experts in data matching and re-identification), reexamine the meaning of "identifiable private information," as defined in paragraph (e)(5) of this section, and "identifiable biospecimen," as defined in paragraph (e)(6) of this section. This reexamination shall take place within 1 year and regularly thereafter (at least every 4 years). This process will be conducted by collaboration among the Federal departments and agencies implementing this policy. If appropriate and permitted by law, such Federal departments and agencies may alter the interpretation of these terms, including through the use of guidance.

(ii) Upon consultation with appropriate experts, assess whether there are analytic technologies or techniques that should be considered by investigators to generate "identifiable private information," as defined in paragraph (e)(5) of this section, or an "identifiable biospecimen," as defined in paragraph (e)(6) of this section. This assessment shall take place within 1 year and regularly thereafter (at least every 4 years). This process will be conducted by collaboration among the Federal departments and agencies implementing this policy. Any such technologies or techniques will be included on a list of technologies or techniques that produce identifiable private

information or identifiable biospecimens. This list will be published in the FEDERAL REGISTER after notice and an opportunity for public comment. The Secretary, HHS, shall maintain the list on a publicly accessible Web site

Food and Drug Administration (FDA) Definitions:

Clinical Investigation: Involves use of a test article (i.e., drug, device, food substance, or biologic), one or more human subjects, meets requirements for prior submission to the FDA (involves drugs or medical devices other than the use of FDA approved drugs or medical devices in the course of medical practice), or results are intended to be part of an application for research or a marketing permit.

Human Subject: As defined by 21 CFR 50.3(e)

1. An individual who is or becomes a participant in research either as a recipient of a test article or as a control or as an individual on whose specimen a device is used.
   OR
2. A human who participates in an investigation, either as an individual on whom or on whose specimen an investigational device is used or as a control. A subject may be in normal health or may have a medical condition or disease. When medical device research involves in vitro diagnostics and unidentified tissue specimens, the FDA defines the unidentified tissue specimens as human subjects.

Test Article: As defined by 21 CFR 50.3(j): Any drug (including a biological product for human use, medical device for human use, human food additive, color, adaptive, electronic product, or any other article subject to regulation under the jurisdiction of the FDA.

Procedure

Process for Determining Whether an Activity Constitutes Human Subject Research

Principal Investigator (PI) Responsibilities

It is the responsibility of each investigator to seek IRB review and approval prior to initiation of any research involving human subjects or before conducting any clinical investigation. The PI is responsible for making a preliminary decision regarding whether their activities meet either:

1. The U.S. Department of Health and Human Services (HHS) definitions of both "research" and "human subjects" and/or
2. The FDA definitions of both "clinical investigation" and "human subjects."

The investigator may contact IRB staff or the IRB Chair/Vice Chairs, for advice on the applicability of the federal regulations.

In cases where it is not clear whether the study requires IRB review, the IRB staff or the IRB may ask the investigator to send a memorandum to the detailing the proposed research. The Director, IRB Chair, or their designees make the final determination whether the activities meet the federal definitions. In addition, investigators may be referred to other policies and departmental processes to assist in this determination.

Examples of Activities That Do Not meet the Definition of Regulated Research:

For the purpose of evaluating whether an activity meets the definition of research, the following activities have been excluded:

1. Scholarly and journalistic activities (e.g., oral history, journalism, biography, literary criticism, legal research, and historical scholarship), including the collection and use of information, that focus directly on the specific individuals about whom the information is collected.
2. Public health surveillance activities, including the collection and testing of information or biospecimens, conducted, supported, requested, ordered, required, or authorized by a public health authority. Such activities are limited to those necessary to allow a public health authority to identify, monitor, assess, or investigate potential public health signals, onsets of disease outbreaks, or conditions of public health importance (including trends, signals, risk factors, patterns in diseases, or increases in injuries from using consumer products). Such activities include those associated with providing timely situational awareness and priority setting during the course of an event or crisis that threatens public health (including natural or man-made disasters).
3. Collection and analysis of information, biospecimens, or records by or for a criminal justice agency for activities authorized by law or court order solely for criminal justice or criminal investigative purposes.
4. Authorized operational activities (as determined by each agency) in support of intelligence, homeland security, defense, or other national security missions.

Related Content

IRB Policy

IRB Jurisdiction

Document Attributes

Title	**Research & Human Subject Definition**		
Author	**Susan Kornetsky**	**Dates Reviewed/ Revised**	4/1/2005 5/4/2007 7/19/2007 1/23/2008 3/12/2010 10/29/2010 5/1/2015 1/24/2020
Reviewed/ Revised by	Susan Kornetsky		
Copyright	©Boston Children's Hospital, 2020	**Last Modified**	11/24/2020
Approved	Susan Kornetsky, MPH Director of Clinical Research Compliance August Cervini, MBA Vice President for Research Administration		