

Common FDA Bioresearch Monitoring Violations: Updates from FY 2022 to Now



The Bioresearch Monitoring (BIMO) Program, operated by the U.S. Food and Drug Administration (FDA), conducts on-site inspections and data audits in order to effectively monitor the compliance of all FDA-regulated research.

As a follow up to our [June 2022 post](#), we highlight the most common violations identified in Fiscal Year (FY) 2022, in addition to those observed thus far in FY 2023. BIMO conducted 766 inspections in FY 2022. The majority of these inspections (approximately 79%) were of drug, biologic, or medical device study clinical investigators, institutional review boards (IRBs), sponsors, clinical research organizations (CROs), and sponsor-investigators. Some of the most common inspection outcomes are highlighted below. Our methodology included a search of FDA's Warning Letter database for FY 2022 and 2023, to date, for letters issued by BIMO and the Center for Drug Evaluation and Research, the Center for Biologics Evaluation and Research, and the Center for Devices and Radiological Health to IRBs, CROs, clinical investigators, sponsors, and sponsor-investigators.

FY 2022:

BIMO conducted 504 inspections of clinical investigators (468 of which were assigned to FDA's drug, biologic, and device Centers), making up over half of BIMO's inspections conducted in FY 2022. Inspections of IRBs, sponsors, CROs, and sponsor-investigators assigned to FDA's drug, biologic, and device Centers comprised another 138 inspections in FY 2022. Of the 504 clinical investigator inspections, only 9 resulted in a classification of "Official Action Indicated" (OAI) and 87 resulted in a classification of "Voluntary Action Indicated" (VAI). The most common inspection observations included: (1) failure to comply with Form FDA 1572 requirements and protocol compliance; (2) failure to follow the investigational plan and protocol deviations; (3) inadequate and/or inaccurate case history records and inadequate study records; (4) inadequate accountability and/or control of the investigational product; (5) safety reporting and failure to report and/or record adverse events; and (6) inadequate subject protection and informed consent issues.

Of the Warning Letters that were issued in FY 2022 to clinical investigators, the most common observations were:

- **Failure to ensure that a clinical investigation was conducted according to its investigational plan.** This finding in various Warning Letters included failure to properly consent participants, failure to properly randomize participants, and/or failure to properly screen potential participants to ensure they met a protocol's inclusion and exclusion criteria prior to enrollment in an investigational plan. For example, in one [Warning Letter](#), an

investigator did not ensure that subjects randomized to a specific intervention group received the assigned investigational drug for that intervention group and did not adhere to the blinding protocol.

- **Failure to submit an IND application for the conduct of a clinical investigation with an investigational new drug.** For example (and similar to trends observed in FY 2021), the FDA noted that one [clinical investigator](#) failed to submit an IND for the use of a product that was determined by the FDA to be a drug. The study design demonstrated that the investigational product was intended to cure, mitigate, and/or treat a disease or condition and therefore, an IND application should have been submitted to the FDA prior to commencing any research activities. Another [Warning Letter](#) included a finding that a protocol comprised of a combination product (a drug and device component) required an IND application.

BIMO conducted 81 inspections of sponsors and CROs in FY 2022 (all but one were assigned to FDA's drug, biologic, and device Centers). Of these, 0 resulted in a finding of OAI, though 15 were classified as VAI. The most common inspection observations included: (1) failure to ensure proper monitoring of the study and ensure the study is conducted in accordance with the protocol and/or investigational plan; (2) failure to meet the abbreviated requirements for investigational device exemptions (IDEs); (3) failure to maintain and/or retain adequate records in accordance with 21 CFR 312.57; (4) accountability for the investigational product; (5) failure to comply with Form FDA 1572 requirements; (6) financial disclosures; (7) failure to submit an Investigational New Drug (IND) application and IND safety reports; and (8) failure to submit current list of all participating investigators to FDA at the six-month interval after FDA approval of the study.

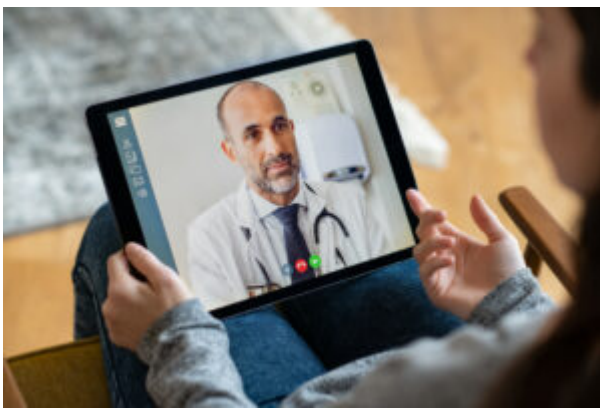
FY 2023 Trends (to date):

In 2023, we have already observed six Form FDA 483 Warning Letters issued to clinical investigators and IRBs, three involving the failure to submit an IND for the conduct of a clinical investigation with an investigational new drug, two involving failure to follow the clinical investigation according to its investigational plan, and one involving overall lack of IRB oversight and IRB compliance. For example, in a 2023 [Warning Letter](#) issued to an IRB, the FDA noted that the IRB: (a) failed to review proposed research at convened meetings at which a majority of IRB members were present; (b) failed to maintain adequate documentation of IRB activities, including keeping an active list of active IRB members; and (c) failed to ensure that information provided to study subjects as part of the informed consent process was done in accordance with applicable FDA regulations. Although sponsors may often make the decision to utilize a central IRB to oversee the conduct of a clinical investigation, some participating sites may be required to utilize their own local IRB, and it is important to remember that any IRB which does not adhere to FDA's requirements can introduce a compliance risk for studies it is engaged to oversee.

Sponsors, clinical investigators, CROs, and IRBs should review the FDA's [BIMO Compliance Program Guidance Manuals](#) regularly to ensure that they understand their responsibilities when carrying out clinical research involving human subjects. Sponsors, clinical investigators, CROs, and IRBs should ensure inspection readiness at all times while bioresearch is ongoing and following completion of bioresearch that may support marketing applications submitted to the FDA. Ensuring diligence in the research site selection process, careful monitoring during clinical trials, and corrective actions when deviations occur can help manage the risk of inspection findings of noncompliance or Warning Letters issued by the FDA. The Goodwin Life Sciences Regulatory & Compliance team provides regulatory counseling on FDA's Good Clinical Practice requirements and the resolution of BIMO inspection findings and Warning Letters when they occur.

[Contact](#) our team to learn more.

The ABCs of DCTs: New FDA Guidance Provides Recommendations for the Conduct of Decentralized Clinical Trials



On May 2, 2023, the U.S. Food and Drug Administration (“FDA”) published draft guidance titled **“Decentralized Clinical Trials for Drugs, Biological Products, and Devices”** (the “Draft Guidance”). The Draft Guidance expands on the FDA’s **2020 recommendations** issued in response to the COVID-19 pandemic and its **2021 draft guidance** on the use of digital health technologies (“DHTs”) in clinical trials, and fulfills the directive under **Section 3606 of the Food and Drug Omnibus Reform Act** to “issue or revise draft guidance [] to clarify and advance the use of decentralized clinical studies to support the development of drugs and devices” no later than December 29, 2023.

The Draft Guidance defines a decentralized clinical trial (“DCT”) as a clinical trial where some or all of the trial-related activities occur at locations other than traditional trial sites. The FDA clarifies that its regulatory requirements for clinical investigations are the same for DCTs as for traditional clinical trials; however, the Draft Guidance outlines how clinical trial sponsors, investigators, and other stakeholders may meet these requirements in the context of DCTs given the FDA’s recognition of the significant potential benefits of DCTs, such as expanding access to clinical trials, increasing trial efficiency, and improving trial participant engagement, recruitment, enrollment, retention, and diversity.

Some of FDA’s key recommendations include:

- An important initial determination is whether it is appropriate for a particular trial to be conducted as a fully decentralized or hybrid DCT. Whereas a fully decentralized trial may be appropriate for an investigational product (“IP”) that is simple to administer, has a well-characterized safety profile, and does not require complex medical assessments, a hybrid approach may be more appropriate where the trial involves more complex medical

assessments or supervision and monitoring of IP administration. The FDA recommends that questions related to the feasibility, design, implementation, or analysis of a DCT should be discussed early with the relevant FDA review division.

- Given that trial-related activities for a DCT may involve a network of locations where clinical trial personnel, local health care providers (“HCPs”), and trial-related services (e.g., labs) may be provided, for inspectional purposes the investigator should select a physical location, to be listed on Form FDA 1572 – Statement of Investigator or in the investigational device exemption (“IDE”) application, where trial participant records will be stored and where trial personnel may be interviewed.
- Both sponsor and investigator should evaluate whether certain trial-related activities may be delegated to DCT personnel located near participants’ homes. Such activities should not require detailed knowledge of the protocol or IP. Trial-related activities that are unique to the trial or require detailed knowledge of the trial protocol or the IP should be performed by qualified trial personnel who have been appropriately trained.
- Obtaining informed consent remotely may be appropriate for a DCT as long as the process is adequate and appropriate. Oversight by institutional review boards (“IRBs”) should ensure that electronic informed consent at remote locations meets applicable requirements, and the FDA recommends the use of a central IRB in DCTs to provide for more streamlined review of the informed consent documents as well the protocol and other trial-related documents.
- As with any trial, sponsors must ensure proper monitoring of DCTs based on the sponsor’s risk assessment. Sponsors should also implement a safety monitoring plan that accounts for the decentralized nature of the clinical trial, including by prespecifying whether safety data will be collected via telehealth or in-person visits and whether DHTs will be used to collect certain safety information. The Draft Guidance underscores the importance of providing sufficient instruction and contact information to the trial participant should an adverse event occur and allowing the participant to arrange an unscheduled visit (either remotely or in-person), as appropriate. The FDA also recently finalized its [Q&A guidance on risk-based monitoring of clinical investigations](#), which we blogged about [here](#).
- FDA notes that the “variability and precision” of data obtained from a DCT may differ from data obtained in a traditional site-based clinical trial. For example, remote assessments may vary from on-site assessments, particularly if trial participants are performing their own assessments at home. Similarly, assessments performed by local HCPs may be less precise and consistent than assessments conducted by on-site trial personnel. FDA states that while such variability may not affect the validity of a finding of superiority, it could compromise a finding of non-inferiority relative to an active control drug that has been evaluated in a traditional site-based trial. FDA therefore recommends that sponsors consult with the relevant review division if planning a DCT with a non-inferiority design.
- For telehealth visits during a DCT, investigators should confirm a participant’s identity during each visit and complete the relevant case report forms and other documentation for each visit. Additionally, the sponsor and investigator are responsible for ensuring that remote clinical trial visits comply with relevant state telehealth laws and as applicable, the telehealth laws of countries outside the U.S.
- Given multiple sources of data collection in a DCT, the sponsor should develop a data management plan that includes the data origin and data flow from all sources to the sponsor; methods for acquiring remote data from trial participants and personnel; and a list of vendors for data collection, handling, and management.

The Draft Guidance demonstrates the FDA’s support of more widespread use of DCTs. At the same time, the Agency acknowledges that DCTs can be challenging to implement successfully, including because DCTs require coordination of trial activities with numerous parties in multiple locations that are not traditional trial sites. The Draft Guidance also notes that if significant safety risks emerge

due to remote administration or use of an IP, or if other circumstances arise that warrant in-person visits, the sponsor should discontinue remote administration or use of the IP, inform the FDA, IRB, and investigators, and determine whether the trial should be amended or continue.

Interested stakeholders may submit comments on the Draft Guidance by August 1, 2023 to Docket [FDA-2022-D-2870](#).

Contact the authors or another Goodwin FDA team member with any questions or if you would like to submit comments to the FDA on the Draft Guidance.

[FDA's Final Q&A Guidance on Risk-Based Monitoring of Clinical Trials Provides Additional Recommendations for Sponsors](#)



The U.S. Food and Drug Administration (FDA) recently finalized its guidance, "[A Risk-Based Approach to Monitoring of Clinical Investigations](#)" (the "2023 RBM Guidance") which follows up on the Agency's March 2019 draft guidance (the "Draft Guidance") of the same name and expands on (but does not supersede) the FDA's August 2013 guidance, "[Oversight of Clinical Investigations - A Risk-Based Approach to Monitoring](#)" (the "2013 RBM Guidance"), with new recommendations summarized below to aid sponsors in implementing an effective and efficient risk-based approach to monitoring both risks to participants and to data integrity throughout all stages of clinical investigations of human drug and biological products, medical devices, and combination products.

(1) Approach: Identify, assess and re-assess risks. Create a plan to manage, mitigate, and/or eliminate those risks, including those risks that are newly identified or may not have been anticipated.

- Risk assessments should inform clinical trial protocol design, investigational plans, and monitoring plans and should be reevaluated and revised throughout the investigation. The monitoring plan should be comprehensive in highlighting identified risks, even those less likely to occur but that could have a significant impact on trial quality or subject safety, and should note how risks will be managed, mitigated, or eliminated.
- Consider how easily detectable the identified risks are, and the severity and consequences of those risks to human subject welfare and data quality if not detected and addressed.
- Assess systemic risks, as well as site-specific risks, and consider whether site-specific risks

have the potential to become systemic risks.

- Determine an approach to on-site monitoring visits by taking into account the risks identified and the complexity and intensity of a clinical investigation. Monitoring activities should evolve based on risks identified during trials and should be proportionate to the risks to participants' rights or safety or to data integrity.
- Implement a centralized monitoring approach to help minimize missing data and protocol deviations in real-time, such as through the use of electronic data capture systems.
- The risk assessment should guide how and to what extent source data verification (SDV) will be utilized during on-site monitoring visits.
- Establish processes to ensure appropriate blinding is maintained. Identify and monitor deviations which could result in unintentional unblinding.
- Be prepared during an FDA inspection to furnish documentation of the sponsor's initial risk assessment, if requested.

(2) Content: Components of the monitoring plan should help explain how the sponsor intends to address the risks that could affect the investigation.

- Include the following components (in addition to those recommended in the 2013 RBM Guidance) in the monitoring plan:
 - Overall investigation design, including blinding and randomization procedures and processes for confirming randomization is performed according to the protocol and investigational plan
 - Sample plan(s), including rationale for, and approach to, identifying the records and data that will be monitored
 - Description of particular issues that would trigger immediate escalation
 - Approach for assessing and addressing a site issue that could escalate into a systemic issue that may warrant protocol or investigation plan changes
- Reference other clinical investigation management plans in the monitoring plan rather than repeating the information in the current monitoring plan to avoid inconsistencies.

(3) Communicate: Promptly address and communicate monitoring results to the appropriate parties to mitigate and eliminate risk.

- Perform monitoring in accordance with the pre-established monitoring plan and address issues as the monitor identifies them, including escalation, if needed.
- Perform a root-cause analysis of issues and promptly implement corrective and preventive actions (CAPAs).
- Consider amendments or revisions to the protocol or the investigational plan.
- Communicate and document significant issues to the relevant parties involved at the sponsor and site level, which may also include institutional review boards, data monitoring committees, and/or regulatory agencies, such as the FDA.
- Provide reports of monitoring activities in a timely manner to the site and discuss the findings with the clinical investigator and site staff. Reports should follow the 2013 RBM Guidance.

While the FDA's regulations require sponsors to monitor the conduct and progress of their clinical investigations, there are no specifics on *how* sponsors are to conduct such monitoring. FDA's guidance provides helpful direction on clinical trial monitoring while recognizing that a monitoring approach should evolve over the course of a trial as risk assessments evolve. Sponsors with upcoming or ongoing clinical trials should consider FDA's recommendations in monitoring plan development and execution of monitoring activities throughout a trial.

Leveraging Investigator-Initiated Trials in Rare Disease Drug Development

Investigators interested in rare disease treatment development have the opportunity to approach drug and biologic developers to obtain investigational drug supply for trials in which the investigators, typically at academic institutions, act as sponsor-investigators. Similarly, companies open to extending their product development pipelines can look to investigator-initiated trials as a mechanism to better understand the overall safety profile for their product candidates while exploring the potential therapeutic utility of their product candidates in diseases where unmet medical needs remain. So often, those needs exist in rare diseases where populations are small and investment returns are difficult to project. Drug developers deciding whether to supply investigational products to sponsor-investigators looking to explore therapeutic potential in areas of their research interests should evaluate what level of involvement to exercise over the investigator-initiated trial. We highlight some of these considerations below.

Company Considerations for Level of Involvement in Investigator-Initiated Trials

- **Availability of resources to support the trial**
 - Amount of investigational product
 - Funding for conduct of trial
 - Other trial support (e.g., administrative, monitoring plan, data management, regulatory submission assistance, training, recruitment, etc.)
- **Relationship-building between Company and Investigator and Investigator's Institution**
 - Establish a relationship that may lead to future collaboration opportunities for Company-sponsored trials
- **Opportunity to utilize trial data to support additional Company INDs, to evaluate potential for expanding product indications (in the case of approved products), etc.**
- **Desire to have:**
 - Input on proposed trial design and later amendments thereto
 - Access, where possible, to emerging data
 - Ability to publish data from the trial
 - Ownership rights in the trial data
 - Inventorship and other intellectual property rights that may arise from the trial
 - Termination rights



Ultimately, drug developers hold the decision-making power over whether to allow investigator-initiated research for their product candidates. Thereafter, the contracting process around the setup of an investigator-initiated trial and clinical supply agreement provides drug developers the opportunity to negotiate their level of involvement in the research of their candidates. In negotiating the setup of investigator-initiated research supply, drug developers often balance their support of research into what are often unmet needs with limited company resources, limited supply that may be available and any potential risks that may flow from trial learnings in the proposed disease space. As an upside, investigator-initiated trials afford developers the opportunity to extend their research reach and product development pipelines, so any interest by investigators to conduct research with industry candidates warrants consideration.

Understanding Data Monitoring Committee Conflict of Interest Limitations

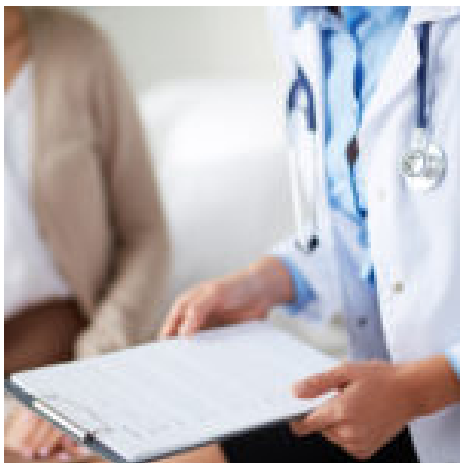


For sponsors utilizing a data monitoring committee in their trial designs to monitor for emerging safety signals, lack of effect, and/or futility of treatment, understanding data monitoring committee conflict of interest limitations is important to ensuring an objective view of the data from a trial. Where we see these conflict of interest considerations put to the test most often is in rare disease trials where the available pool of informed experts can be just as small as the patient populations under study. As explained in FDA's final [guidance](#) for industry on this topic, core considerations for avoiding potential conflicts of interest in data monitoring committee member selection include:

- **Financial interests.** Here, careful consideration must be given to whether any prospective committee member holds ownership interests in the sponsor entity or stands in a position to benefit financially from the outcome of the trial. This can include equity or stock interests, employee or temporary employee status, paid consulting or advisory board relationships with the sponsor, prior research funding from an institution involved in the study, whose product is being evaluated in the study or competes with a product being evaluated in the study, among other things. FDA generally recommends against appointing any committee members with *ongoing* financial relationships to the trial's sponsor.
- **Other roles in the trial.** Those individuals entering subjects into and conducting a trial stand in a considerable conflict position given their knowledge of interim data emerging from subjects at their trial site which could influence the recruitment or monitoring trends of those individuals for the trial. As such, FDA generally recommends against appointing any committee member who is serving as an investigator in the trial the data monitoring committee would oversee. Additionally, FDA disfavors appointment of any members that have had input into the design of the trial or are involved in the conduct of the trial in any other role for similar reasons.
- **Intellectual conflicts.** Perhaps most challenging to evaluate and navigate in rare disease trials is the risk to objectivity that strongly held views of prospective data monitoring committee members could play in their ability to review the data in a fully objective manner. This could include prospective committee members with strong views on the relative merits of the intervention under study vs. others under development. Additionally, FDA recommends against appointing committee members with strong relationships to or personal differences with trial investigators or to sponsor employees which are likely to cloud their objectivity.

FDA recognizes the tension that sponsors must navigate between placing a high value on independence and avoidance of conflicts of interest in the composition of its data monitoring committees, on the one hand, and understanding the importance of a well-informed data monitoring committee to the effective oversight of emerging data from a trial, on the other. While there is no one-size-fits all approach, data monitoring committee charters and sponsor conflict of interest policies can be helpful in this regard to establish and document the sponsor's limitations on engagement and interaction with the committee and vice versa. The more interconnected the sponsor-developer and investigator communities become, the more challenging it may become for sponsors, particularly those in the rare disease space, to ensure the objectivity of its data monitoring committees.

Common Bioresearch Monitoring Violations: Updates from FY 2021 to Now



The Bioresearch Monitoring Program (BIMO), run by the U.S. Food and Drug Administration (FDA), oversees the conduct of on-site inspections and data audits of FDA-regulated research in support of new product development and marketing approvals. As a follow up to our [July 2021 post](#), we highlight here the most common violations FDA's BIMO identified in Fiscal Year (FY) 2021 along with those we have seen so far in FY 2022. Our review focuses on BIMO's clinical investigator, sponsor, and contract research organization (CRO) inspection outcomes across 516 inspections conducted in FY 2021, as these comprised nearly 85 percent of all BIMO inspections.

Amongst these, 81 percent did not result in any findings of noncompliance. Eighteen percent resulted in findings of noncompliance but without recommending regulatory action, and about one percent resulted in findings of noncompliance recommending official regulatory action. In FY 2021, the most common violations leading FDA to issue a Form FDA 483, FDA's official form for documenting noncompliant inspection findings, included:

- **Failure to submit an IND application.** For example, FDA issued several Warning Letters for investigations of dietary supplements or foods determined by the FDA to be drugs. FDA found that the study designs demonstrated the investigational products were intended to cure, mitigate, and/or treat a disease or condition, triggering application of FDA's drug authorities and requiring an Investigational New Drug (IND) application to be in place before conducting

the research.

- **Failure to follow the investigational plan and implement corrective or preventive action plans.** For example, in one [Warning Letter](#) resulting from a BIMO inspection, the FDA noted that the investigator failed to exclude subjects according to the study's exclusion criteria and did not identify any procedures in place to prevent future violations.
- **Inadequate or inaccurate recordkeeping (including case histories, study records, and drug disposition records).** For example, in one recent [Warning Letter](#) following a BIMO inspection, the FDA noted that a study site failed to retain necessary documents for 2 years following marketing approval when it could not locate informed consent forms and case report forms, amongst others, from a study for which a Biologics License Application was pending.

Of note, these continue to be the most frequently cited violations in BIMO Warning Letters issued to date in 2022. To avoid these missteps and better understand the scope of their respective responsibilities before, during, and after a clinical trial, sponsors, CROs and investigators should review [FDA's BIMO Compliance Program Guidance Manuals](#) and ensure adoption of standard operating procedures (SOPs) that provide an infrastructure for regulatory compliance. Sponsors and investigators should also ensure that they understand when an IND application is required, and review the requirements for appropriate recordkeeping during and after a clinical trial. Finally, sponsors and CROs should have mechanisms in place to both promote protocol adherence and promptly respond to any deviations when they inevitably occur. Sponsors receiving BIMO Form FDA 483s should respond with a detailed explanation of their root cause findings, corrective actions, and their plan to prevent similar missteps in the future. The Goodwin FDA team works closely with sponsors to apply FDA's Good Clinical Practice requirements and to resolve BIMO inspection findings when they occur.

[Connect](#) with our Goodwin FDA team to learn more.

*Maura Friedlander, a 2022 summer associate in Goodwin's Washington, D.C. office, contributed to this post.

[For Clinical Trial Recruiting, Words Matter](#)



In a recent publication we helped co-author, we examined ClinicalTrials.gov entries and their possible impact on informing potential subjects of their eligibility to participate in clinical trials. In particular, we analyzed certain clinical trials focused on HIV treatment or prevention that allowed

entry of pregnant women to assess the use of pregnancy-related terms in each trial's description and inclusion/exclusion criteria, such as those relating to gestational age and trimester. The assessment focused on evaluating the potential utility of ClinicalTrials.gov for pregnant women and their healthcare providers in identifying potential clinical research in which they may be eligible to participate. In brief, we found that descriptors and terminology can play an important role in communicating with providers and prospective subjects about eligibility for participation. While our findings are in the context of HIV research and pregnant women, our takeaways could apply to other disease areas and populations where specific terminology may play a role in successful identification and recruitment of eligible patients, particularly where competition for patients presents an ongoing challenge, such as rare diseases.

Read the full [article](#) in *Contemporary Clinical Trials Communications*.

On Remote Control: FDA Issues Draft Guidance to Facilitate Use of Digital Health Technologies for Remote Data Acquisition in Clinical Trials



During the COVID-19 pandemic, decentralized clinical trials and remote patient monitoring and data acquisition became a necessity, accelerating the use of digital health technologies in clinical trials. Acknowledging that technological advances “have revolutionized the ability to remotely obtain and analyze clinically relevant information from individuals” and that “DHTs [] are playing a growing role in health care and offer important opportunities in clinical research,” the FDA issued during the last week of December 2021 a draft guidance, **[Digital Health Technologies for Remote Data Acquisition in Clinical Investigations](#)**, which provides recommendations for sponsors, investigators and other stakeholders to facilitate the use of DHTs for remote data acquisition in clinical trials, including clinical trials that will be submitted to the FDA in a marketing application for a medical product.

The draft guidance defines a digital health technology (DHT) as a system that uses computing platforms (such as a mobile phone, tablet, or smart watch), connectivity, software, and/or sensors for healthcare and related uses. Some DHTs may meet the definition of “device” under the Federal Food, Drug and Cosmetic Act, but the draft guidance specifically does not address the circumstances under which a DHT would meet the statutory definition of a device and notes that DHTs used in clinical investigations generally are exempt from premarket clearance or approval requirements, as long as the clinical investigation is compliant with 21 CFR Part 812.

The draft guidance explains that sponsors must foremost ensure that a DHT is “**fit-for-purpose**” for its proposed use in a specific clinical investigation. In essence, the level of verification and validation associated with the DHT must be sufficient to support its use and interpretability in the clinical investigation. This may require sponsors to work with the developer or manufacturer of the DHT, patients, caregivers, and other technical and clinical experts to assure that the DHT is suitable for its intended purpose in the clinical investigation. The draft guidance advises sponsors to select a DHT that corresponds to the clinical outcome to be assessed, and that considers the clinical trial population and the design/operating characteristics of the DHT that may affect trial participants’ use of the DHT.

Sponsors should also be prepared to describe how they will analyze data collected from DHTs in their statistical analysis plan, including prespecifying “**intercurrent events**” (defined as events that occur after treatment initiation that result in missing or erroneous data associated with the clinical outcome of interest) that may be related to the DHT and/or the general purpose computing platform, and how these events will be accounted for in the analysis. To maintain data integrity, FDA recommends that the output of the DHT and associated metadata be transmitted to a **durable electronic data repository** that is protected from alterations and maintained until the end of the record retention period. FDA generally will consider data in such a repository to constitute the source data and should be made available for inspection and to reconstruct and evaluate the clinical investigation.

FDA further notes that “unique privacy risks” may arise when DHTs are used in a clinical trial. Sponsors are advised to evaluate the risk of potential disclosures of personally identifiable information through breaches of the DHT, the general computing platform on which the DHT runs, and/or the durable electronic repository, assure appropriate security safeguards are in place, and consider including such information in the informed consent documents for the clinical trial.

The draft guidance recommends that sponsors:

- train trial participants and trial personnel on the use of DHTs and develop a plan to provide technical assistance to trial participants and study personnel;
- develop a risk management plan to address potential problems with the DHT (e.g., interference between mobile applications, or loss, damage and replacement);
- develop a safety monitoring plan that addresses how abnormal measurements related to participants’ safety measured by DHTs will be reviewed and managed; and
- develop a contingency plan for any changes to the DHT (e.g., discontinuation of a specific model, operating system updates)

The draft guidance includes appendices with specific examples of how different types of DHTs could be incorporated into a clinical investigation. Given the particular circumstances of each DHT and clinical investigation, the draft guidance encourages sponsors to engage early with the appropriate FDA Center responsible for the medical product under development to discuss the proposed use of DHT(s) in a clinical investigation and, for DHTs or DHT-collected endpoints that require qualification, engage with an appropriate FDA qualification program, such as the [**Medical Device Development Tool Qualification Program**](#).

[**Comments**](#) on the draft guidance are due **March 23, 2022**.

Reality Check: FDA Draft Guidance Outlines Considerations for the Use of Real-World Data and Real-World Evidence to Support Regulatory Decision-Making for Drugs and Biological Products



Last week the FDA issued another draft guidance in its series of recent guidance documents setting forth the agency's views regarding the generation and use of Real-World Data (RWD) and Real-World Evidence (RWE) for prescription drugs and biological products. (see our [recent post](#) on FDA's draft guidance relating to registries).

This latest draft guidance, [Considerations for the Use of Real-World Data and Real-World Evidence to Support Regulatory Decision-Making for Drug and Biological Products](#), clarifies the agency's expectations for sponsors submitting new drug applications (NDAs) or biologics license applications (BLAs) with studies using Real-World Data (RWD) to support the safety or effectiveness of drugs or biological products, when such studies are not subject to FDA's investigational new drug (IND) application requirements under [21 CFR Part 312](#). The draft guidance focuses on non-interventional (*a.k.a.* observational) studies, in which patients receive a drug during routine medical practice, according to a medical provider's clinical judgment and based on patient characteristics, rather than via assignment to a study arm and according to a clinical trial protocol.

Key considerations outlined in the guidance:

- *Sponsors designing a non-interventional study to support a marketing application should engage early with the relevant FDA review division (e.g., through a Type C meeting) and be prepared to submit draft protocols and SAPs for FDA feedback before conducting the study analyses.*
- *To assure the FDA that the results of a non-interventional study were not skewed to favor a particular conclusion, sponsors should provide evidence that the non-interventional study protocol and statistical analysis plan were finalized prior to reviewing outcome data and before performing prespecified analyses. Sponsors should provide a justification for selecting relevant data sources and generate audit trails in their datasets. FDA also recommends that sponsors post their non-interventional study protocols on a publicly available website, such as [ClinicalTrials.gov](#).*
- *Sponsors must be able to submit patient-level data from the RWD. Where a third party owns or controls the RWD, sponsors should have agreements with such parties to ensure that patient-level data and source data to verify the RWD can be provided to the FDA for inspection, as*

applicable. Sponsors should have well-documented programming codes and algorithms that would allow the FDA to replicate the study analysis using the same dataset and analytic approach.

- *Non-interventional studies should be monitored.* The FDA advises sponsors to use a risk-based quality management approach, with a focus on preventing or mitigating important and/or likely risks to study quality. If a non-interventional study does not include any activities or procedures involving patients, monitoring can focus on assuring the data integrity of the RWD, from extraction to analysis to reporting of results. When a non-interventional study protocol includes ancillary activities or procedures, sponsors should exercise appropriate oversight of processes critical to human subject protection.
- *Adverse events that a sponsor becomes aware of through a non-interventional study must be submitted in accordance with postmarketing safety reporting regulations.* However, the agency acknowledges that if a sponsor is conducting a non-interventional study that appropriately utilizes only a subset of a larger dataset, the sponsor will not have to search the entirety of the dataset for adverse events.
- *Sponsors should take responsibility for all activities related to the design, conduct and oversight of a non-interventional study that is being submitted for regulatory review.* This includes selecting qualified researchers, ensuring the study is conducted in accordance with the protocol, maintaining and retaining adequate study records, and maintaining an electronic system to manage RWD that complies with [21 CFR Part 11](#). Where a sponsor engages third parties to perform certain study-related tasks, the responsibilities of each organization should be documented and made readily available to the FDA upon request.

Comments on the guidance should be submitted to the [docket](#) by March 9, 2022.

It's Starting to Register: FDA Draft Guidance Addresses Use of Registries to Support Regulatory Decision-Making for Drugs & Biological Products



Showing no signs of food coma, the FDA issued [draft guidance](#) on the Monday following the Thanksgiving holiday weekend that outlines considerations for sponsors proposing to design a

registry or use an existing registry to support regulatory decision-making about a drug's effectiveness or safety. This draft guidance represents the Agency's latest response to the mandate in the 21st Century Cures Act to issue guidance on the use of real world evidence in regulatory decision-making, and expands on the [Framework for FDA's Real-World Evidence Program](#) from December 2018.

The draft guidance, [Real-World Data: Assessing Registries to Support Regulatory Decision-Making for Drug and Biological Products](#), defines a registry as "an organized system that collects clinical and other data in a standardized format for a population defined by a particular disease, condition, or exposure," and identifies three general categories of registries: disease registries, health service registries, and product registries.

Given the range of registry types, FDA notes that registry data can have varying degrees of suitability for use in a regulatory context depending on several factors, including how the data are intended to be used for regulatory purposes, the patient population enrolled, the data collected, and how registry datasets are created, maintained, curated, and analyzed. FDA advises sponsors to be mindful of both the strengths and limitations of using registries as a source of data to support regulatory decision-making. In general, the draft guidance advises that (i) a registry that captures objective endpoints, such as death or hospitalization, is more likely to be suitable to support regulatory decision-making than a registry that collects subjective endpoints, such as pain; and (ii) a registry that is specifically designed to answer a particular research question is more likely to be useful to support regulatory decision-making than a registry that was designed for a different purpose.

At the same time, the Agency acknowledges that an existing registry can be used to collect data for purposes other than those originally intended, and that leveraging an existing registry's infrastructure to support multiple purposes can be efficient. Therefore, the draft guidance describes factors sponsors can use to assess the **relevance** and **reliability** of a registry's data to determine whether the registry data may be fit-for-use.

When determining **relevance** of registry data, the draft guidance advises sponsors to consider, among other things, whether the data elements captured by the registry are sufficient given the intended use or uses of the registry (e.g., external control arm vs. a tool to enroll participants in an interventional study) and whether the methods involved in patient selection may have impacted the representativeness of the population in the registry.

When assessing the **reliability** of registry data, the draft guidance advises sponsors to assure the registry has appropriate governance measures in place to help ensure the registry can meet its objectives, such as processes and procedures governing the operation of the registry, adequate training of staff, and other recommended practices including:

- Defined processes and procedures for data collection, management and storage;
- A data dictionary and rules for validation of queries and edit checks of registry data;
- Conformance with [21 CFR part 11](#), as applicable, including access controls and audit trails; and
- Adherence to applicable human subject protection requirements, including safeguarding the privacy of patient health information.

The draft guidance specifically recommends that sponsors interested in using a registry to support a regulatory decision should meet with the relevant FDA review division (e.g., through a Type C meeting), *before* conducting a study that will include registry data. Sponsors also should be prepared to submit protocols and statistical analysis plans for FDA feedback prior to conducting a

study that includes data from registries.

Comments on the guidance should be submitted to the [docket](#) by February 28, 2022.