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- 4 21ST CENTURY CURES: EXAMINING THE REGULATION OF LABORATORY
- 5 DEVELOPED TESTS
- 6 TUESDAY, SEPTEMBER 9, 2014
- 7 House of Representatives,
- 8 Subcommittee on Health
- 9 Committee on Energy and Commerce
- 10 Washington, D.C.

11 The Subcommittee met, pursuant to call, at 9:32 a.m., in

12  $\,$  Room 2322 of the Rayburn House Office Building, Hon. Joe

13 Pitts [Chairman of the Subcommittee] presiding.

Members present: Representatives Pitts, Burgess,
Shimkus, Blackburn, Guthrie, Griffith, Bilirakis, Ellmers,
Pallone, Schakowsky, Green, Barrow, and Waxman (ex officio).

17 Also present: Representative Eshoo.

18 Staff present: Clay Alspach, Chief Counsel, Health; 19 Leighton Brown, Press Assistant; Noelle Clemente, Press 20 Secretary; Sydne Harwick, Legislative Clerk; Robert Horne, 21 Professional Staff Member, Health; Carly McWilliams, 22 Professional Staff Member, Health; Tim Pataki, Professional 23 Staff Member; Chris Sarley, Policy Coordinator, Environment 24 and Economy; Heidi Stirrup, Health Policy Coordinator; John 25 Stone, Counsel, Health; Ziky Ababiya, Democratic Staff 26 Assistant; Phil Barnett, Democratic Staff Director; Eric 27 Flamm, Democratic FDA Detailee; Debbie Letter, Democratic 28 Staff Assistant; Karen Nelson, Democratic Deputy Committee 29 Staff Director for Health; and Rachel Sher, Democratic Senior 30 Counsel.

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31 Mr. {Pitts.} The subcommittee will come to order. The 32 chair will recognize himself for an opening statement. Today's hearing is another in a series of 21st Century 33 34 Cures hearings. Primarily focuses on FDA's July 31, 2014, 35 notification to Congress that it intends to issue draft 36 quidance on a framework for oversight of the laboratory 37 developed test, the LDTs. This notification was required by 38 Section 1143 of the Food and Drug Administration's Safety and Innovation Act of 2012, and provides us with an opportunity 39 40 to hear from the Agency about whether it has adequately 41 answered the myriad of procedural and substantive questions 42 that were the subject of much debate leading up to the 43 passage of FDASIA.

It is indisputable that the draft guidance documents the Agency recently released would fundamentally alter the regulatory landscape for the review and oversight of LDTs and the clinical labs that develop them. That fact alone has raised legitimate concerns about whether FDA can or should use guidance to promulgate a new regulatory approach. It is also indisputable that innovative laboratories and health

51 care providers develop and perform tests and procedures that 52 advance personalized patient care. Because of the critical role they can play in the decisions patients make with their 53 54 doctors, these tests, regardless of who develops or 55 manufactures them, must be accurate and reliable. Any 56 framework adopted must not only prioritize patient safety, 57 which should always be paramount, but also encourage robust 58 investment and allow for continued innovation. In order for 59 that to happen, a company or venture capitalist that invests in the development, testing, and FDA review of a diagnostic 60 61 product must have the certainty that labs will not copy it 62 and promote their alternatives the next day. On the other 63 hand, many innovative tests and procedures are developed in 64 labs, including continuous, iterative improvements to FDA-65 approved products that often become the standard of care. Any regulatory approach must carefully address these complex 66 67 issues.

Dr. Shuren has been a key voice throughout the 21st Century Cures initiative, and I thank him for his willingness to come to the table yet again. The Committee invited CMS to testify on its roles and responsibilities administering the

72	Clinical Laboratory Improvement Amendments regulations, which
73	includes lab practices, certification, and personnel, but
74	they were unable to do so.
75	We have a number of questions about FDA's proposed path
76	forward, and I look forward to hearing from all of our
77	witnesses on the second about its potential impact.
78	And with that, the chair yields back, and now recognize
79	the Ranking Member, Mr. Pallone, for 5 minutes.
80	[The prepared statement of Mr. Pitts follows:]
81	************* COMMITTEE INSERT *************

82

Mr. {Pallone.} Thank you, Chairman Pitts.

New technologies and advances in medicine can improve the quality of life for millions of Americans, but the use of these advances can also pose serious risk to individual patients if they are not clinically accurate. And this is why we have regulation, and it is why the FDA has proposed commonsense changes that merely bring safety regulations upto-speed with medical progress.

90 Lab-developed tests have come a long way since Congress 91 gave FDA the authority to regulate all in vitro diagnostic 92 tests in 1976. Advances in science and technology have 93 enabled labs to develop more sophisticated tests that allow 94 physicians to identify genetic factors in diagnosing disease, 95 and this has allowed for early detection and more targeted 96 medical interventions.

97 Recently, genetic tests have identified specific gene 98 sequences which can help doctors design an approach that 99 patients are more likely to respond to. Identifying the 100 HER2/neu gene in patients allowed oncologists to target this 101 unique form of breast cancer with the drug Herceptin, instead

102 of radiation, vastly improving patient outcomes. Similarly, 103 the identification of mutations of the BRCA2 gene--or BRCA1 and BRCA2 genes, can tell doctors if a patient is at an 104 105 increased risk for developing breast or ovarian cancer. Last year, the actress, Angelina Jolie, revealed that she learned 106 107 she was carrying the BRCA1 gene, and had an 87 percent risk 108 of developing breast cancer. Armed with this information, 109 the actress and her doctors took drastic action to prevent 110 the likely onset of cancer later in life, and based on the 111 results of this test, she took her future health into her own 112 hands and obtained a preventative double mastectomy. And 113 while the actress's actions have inspired considerable debate 114 as to who should get tested, and to what extent they should undertake preventative measures, the fact remains that many 115 116 of these tests, including those used in detecting the BRCA 117 genes, never obtained FDA approval.

The consequences of information provided by tests like these is great, which is why in 2010 the Subcommittee on Oversight and Investigation and GAO explored tests directly marketed to consumers. In its investigation, GAO found that these tests provided individuals with a wide array of

123 results, with little consistency from test to test. And given the impact on patients of the results of these tests, 124 125 whether leading some to miss real risk and others to seek 126 treatment they don't need, it should be clear that the information LDTs provide is of great--grave consequence, and 127 128 that is why many of the major cancer advocacy groups welcome 129 greater FDA oversight. In response to the FDA's 130 announcement, Calaneet Balas, Chief Executive of the Ovarian 131 Cancer National Alliance, said, and I quote, ``we in the 132 ovarian cancer community know firsthand the danger of a test that hasn't gone through FDA approval. Oversure and early 133 134 detection tests for ovarian cancer came to market in 2008, 135 without independent verification and oversight, and this test 136 didn't accurately predict ovarian cancer cases, leading 137 otherwise healthy women to have their ovaries removed based 138 on bad information. When a test routinely provides false 139 positives, it is a problem, however, when that test is used to diagnose and treat cancer, it is a potentially fatal 140 problem for millions of patients, and the clear demonstration 141 of the need for greater FDA oversight.'' 142

143 I believe, Mr. Chairman, we have a responsibility to

144 provide patients with greater certainty. Furthermore, we 145 want to empower the medical community to harness these new 146 technologies to improve patient health and outcomes, and 147 eventually perhaps bend the cross curve. And while doctors have years of training and their patients' interests at 148 149 heart, they are only as good as the tools they use. 150 Physicians need to be able to trust the results of diagnostic 151 tests so they can develop effective interventions.

152 It seems to me that regulating LDTs and other tests differently based on who makes them doesn't make sense. This 153 154 is especially true given the scientific progress that has 155 enabled lab-developed tests to have even greater impacts, 156 both for good and for bad. If we want to promote the development of personalized medicine, which I think we all 157 158 recognize is the future of medicine and the foundation of 159 21st Century Cures, then we need to ensure that highly 160 complicated and potentially groundbreaking advances are 161 clinically valid.

162 So, Mr. Chairman, this regulatory proposal has been in 163 the work for some time, so think we are all eager to hear 164 from FDA about it. In addition, I look forward to hearing

165	from other stakeholders about their views of the FDA
166	proposal, because it is critical that its implementation
167	ensures the safety of patients, but also allows for the
168	continued advancement of cutting-edge personalized medicine,
169	and I do not believe the 2 are mutually exclusive, but rather
170	can be mutually supportive.
171	I also wanted to tell you again I enjoyed coming out to
172	Lancaster for the field hearing that we had a few weeks ago.
173	Thank you.
174	[The prepared statement of Mr. Pallone follows:]

176 Mr. {Pitts.} Thank you. That was very productive and177 thank you for coming out.

178Chair now recognizes the Vice Chairman of the179Subcommittee, Dr. Burgess, 5 minutes for an opening

180 statement.

181 Dr. {Burgess.} Thank you, Mr. Chairman, and let me 182 agree with Mr. Pallone that the Cures roundtable that you had 183 in Lancaster was very worthwhile, and I think we all learned 184 a lot. It is just ironic that as we are proceeding with the Cures Initiative, and trying to remove some of the barriers, 185 186 we are trying to facilitate the faster Cures, the promise of the 21st Century, that this morning we are having a hearing 187 on what I consider to be a potential new roadblock or 188 189 bottleneck on that path to Cures.

I have been to every Cures event here in D.C., I have been to several around the country. Repeatedly, we hear the potential for genomic medicine to help us understand illness, quickly diagnose it, and target treatment. This has been embraced in a bipartisan manner, and I strongly believe in that potential. Here is an example. A few months ago, the

196 Centers for Disease Control briefed my office on an emerging 197 global threat in the form of a virus. They had sequenced the 198 virus, provided information to researchers, and even knew 199 where in the particular country's jungle the virus had originated. It was impressive, to say the least. 200 201 Here is another one. Back in 2009, H1N1, and many of us 202 remember, that subtype of the influenza A virus spread very 203 rapidly. During the first week of the outbreak, 16 204 laboratories had laboratory-developed tests that could 205 identify H1N1 from other H1 viruses. Most were available within 24 hours. The speed helped inform public health 206 207 reactions. The FDA had no approved commercial kit, however, 208 if they had, under this proposed framework which we are discussing this morning, if they had had a test, even if it 209 210 was much older and inferior, these laboratory-developed tests 211 would have been blocked from doctors and public health 212 officials.

The Food and Drug Administration regulation of tests Like these will be burdensome, and will slow the ability of clinical laboratories to develop tests that can allow us to respond to public health crises when they occur. This is

217 also duplicative. Congress established a regulatory framework applicable to labs and laboratory testing, known as 218 219 the Clinical Laboratory Improvement Acts of 1988, or CLIA. I 220 am concerned that additional review of certain tests may be warranted, but previously I did introduce legislation to meet 221 222 patient needs and ensure tests are accurate, reliable and 223 clinically valid by making improvements to CLIA, not 224 replacing it. I authored Section 1143 of the Food and Drug's 225 Safety Innovation Act so would we--we would be able to 226 discuss how patients, the practice of medicine, innovation and the economy could be harmed if the FDA tried to fit 227 228 laboratory-developed tests into a misaligned definition of a 229 medical device. 230 I fundamentally believe that the FDA has no statutory

authority to regulate laboratory-developed tests. For FDA to have jurisdiction, it must have a traditional device and be commercially distributed amongst the states. LDTs do not fall under either category. Professional medical services are currently not regulated by the FDA, and I do not believe they should be.

237 In addition to these significant jurisdictional issues,

238 the process the Food and Drug Administration is considering is of great concern. Even the courts determined that the FDA 239 240 authority over laboratory-developed tests, the Agency would 241 need to amend its current regulations through rulemaking. The Food, Drug and Cosmetic Act, the Administrative 242 243 Procedures Act of the Supreme Court all require disseminating 244 rules to modify current regulation, or to create legally-245 enforceable regulations. Instead, the Agency continues on 246 with its jurisdictional power grab by attacking innovation, 247 threatening professional practice, and risking jobs in order 248 to claim authority over everything they see. They are doing 249 this even at the expense of allowing the core mission of the 250 FDA to suffer as a consequence. I can't think of a worse 251 result; denying patients and doctors innovative tests, while 252 redirecting resources that could be used to approve the next 253 miracle drug or device.

Mr. Chairman, I would ask unanimous consent to insert into the record a statement by the American Medical Association on the topic of this hearing this morning.

257 Mr. {Pitts.} Without objection, so ordered.

258 [The information follows:]

Dr. {Burgess.} And further, Mr. Chairman, I would also 260 261 like to submit into the record a copy of a bill, Senate Bill 262 796, introduced March 23 of 2007, by Senator Obama and Senator Burr, and this was the personalized medicine for all 263 264 Americans by expanding, accelerating genomics research and 265 initiatives, and one of the key parts of this legislation was 266 to create within CLIA a specialty area for molecular medicine 267 and genetics and clinical tests, instead of supplanting the--CLIA with the FDA, this proposal would have actually 268 269 modernized CLIA in an approach that I think would be much 270 more useful. So I will submit this -- a copy of this 271 legislation for the record also. 272 I appreciate the indulgence, and I am going to yield 273 back. 274 [The prepared statement of Dr. Burgess follows:]

Mr. {Pitts.} Without objection, so ordered. [The information follows:]

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279	Mr. {Pitts.} All Members' opening statements will be
280	made a part of the record.
281	We have two panels today. On our first panel, we have
282	Dr. Jeff Shuren, Director, Center for Devices and
283	Radiological Help, U.S. Food and Drug Administration. Thank
284	you very much, Dr. Shuren, for coming today. You will have 5
285	minutes to summarize, and your written testimony will be made
286	a part of the record. So at this point, Dr. Shuren, you are
287	recognized for 5 minutes for an opening statement.

288 ^STATEMENT OF JEFFREY SHUREN, M.D., J.D., DIRECTOR, CENTER

289 FOR DEVICES AND RADIOLOGICAL HEALTH, FOOD AND DRUG

290 ADMINISTRATION

291 } Dr. {Shuren.} Mr. Chairman and Members of the 292 subcommittee, thank you for the opportunity to testify today. 293 FDA's risk-based proposal for oversight of laboratory-294 developed tests, or LDTs, is intended to ensure that patients 295 and their health care providers make major medical decisions based upon accurate, reliable and clinically-meaningful test 296 297 results, while encourage development and access to new tests. 298 It would focus on those LDTs that pose the greatest risk to patients if the results are not accurate. 299

300 FDA historically exercised enforcement discretion over 301 LDTs, namely, we opted not to enforce requirements LDT makers 302 were subject to, because back in 1976, LDTs were limited in 303 number, relatively simple tests, and typically were used to 304 diagnose rare diseases and uncommon conditions. LDTs offered 305 today, however, are often very different from those 40 years 306 ago. These tests have increased in both complexity and

307 availability, and many are now used to diagnose common diseases and conditions. Increasingly, patients and their 308 309 health care providers are relying on the results of LDTs to 310 make major medical decisions. This evolution in complexity 311 and volume has significantly increased patient risk of harm 312 from higher risked LDTs, and in some cases, there were 313 already FDA-proved tests available; tests proven to be safe 314 and effective. So using an LDT may put patients at 315 unnecessary and avoidable risks.

These risks are not theoretical. There are cases of faulty LDTs for cancer, infectious diseases, heart disease and other conditions leading to the wrong diagnosis, sometimes resulting in the wrong treatment, or the failure to treat when an effective therapy is available, and resulting in unnecessary costs to our health care system and American taxpayers.

Numerous stakeholders believe the current system of uneven oversight is having a negative impact on innovation. Conventional device manufacturers may go through the premarket review process and obtain clearance or approval of--for an IVD kit, only to be faced with immediate competition

328 from labs manufacturing and marketing similar tests which did not obtain premarket review or meet other requirements to 329 330 assure their tests are accurate and reliable. This has 331 crated disincentives for them to invest in developing 332 innovative tests, and creating more U.S. jobs. But we have 333 also heard from some academic medical labs that they make 334 tests to address unmet needs, because there are no FDA-335 approved tests. We understand the value of and the need for 336 these types of tests. Therefore, after listening to the perspectives from a broad range of stakeholders, we opted not 337 to propose the same level of oversight for all the LDTs, nor 338 339 to create a completely level playing field between tests 340 developed by labs and those made by conventional manufacturers. Instead, we would continue to exercise 341 342 enforcement discretion for many LDTs, including those that 343 are low risk, LDTs for rare diseases, LDTs for unmet needs 344 where no FDA clear or approved test exists for that specific 345 intended use if made by a health care facility responsible 346 for the care of the patient. FDA would also focus on high and moderate risk LDTs, and phase-in premarket review 347 requirements for this subset over 9 years using a public 348

349 process that includes expert advisory panels, as even recommended by the lab community. This flexible approach 350 351 would balance the importance of accurate test results, with 352 the need to facilitate innovation and prevent disruption of 353 access to diagnostics. The more narrowly tailored and 354 balanced oversight approach that we would propose for LDTs is 355 also critical to the success of personalized medicine. 356 Getting the right treatment to the right patients depends 357 upon having accurate and reliable tests to identify who are, in fact, the right patients, and who should not receive a 358 359 treatment that can cause them harm but provide no benefit. 360 LDTs that steer patients to the wrong treatments 361 unnecessarily hurts patients, while jeopardizing the 362 advancement of personalized medicine altogether.

We seek to facilitate innovation and test development, and we seek to assure that tests are safe and effective. The issue should not be do we regulate, but rather how we should regulate to best achieve both of these important objectives, the dual objectives that are at the core of the FDA's statutory mission; to protect and promote public health. Patients deserve no less, and our health care system can

370	afford no less. That is the dialogue we need to have with
371	laboratories, conventional device industry, as well as
372	patients, providers, and other members of our medical device
373	community.
374	So thank you for the opportunity to testify today, and I
375	will take any questions that you may have.
376	[The prepared statement of Dr. Shuren follows:]

Mr. {Pitts.} The chair thanks the gentleman. 378 379 And we will now go to questioning. I will begin the questioning, and recognize myself 5 minutes for that purpose. 380 Dr. Shuren, issuing this guidance document would 381 382 constitute a significant change to almost 4 decades of Agency 383 policy. It goes well beyond a set of recommendations or a 384 description of current Agency thinking. How would 385 implementing this new regulatory framework via guidance 386 comply with the Administrative Procedures Act? Dr. {Shuren.} So we have in place what we call an 387 388 enforcement discretion policy. Labs are currently subject to the requirements of the Food, Drug and Cosmetic Act. We 389 have, as a matter of policy, opted not to enforce compliance. 390 391 Those kinds of general policy statements where we are not imposing a new requirement, that requirement is there but we 392 393 are enforcing it, we are not interpreting legal norms, are 394 not subject to Administrative Procedures Act to rulemaking. 395 Mr. {Pitts.} Understanding this approach would be a departure from existing practice, and have a substantial 396 impact on regulated industry. Is the FDA not required to 397

398 proceed with notice and comment rulemaking?

399 Dr. {Shuren.} No. Under the Administrative Procedures 400 Act, this change in enforcement discretion policy is not 401 subject to those requirements.

Mr. {Pitts.} If a company or any other individual to 402 403 entity invest in the research and development of an 404 innovative diagnostic test and it is approved or cleared by 405 FDA, I feel as though labs should not be able to simply copy 406 the technology and market their own version the next day. 407 This is particularly relevant if the test was reviewed as a companion diagnostic in concert with a drug. How frequently 408 409 does this situation occur, and what can we do to address it? 410 Dr. {Shuren.} Well, our understanding is it does happen 411 commonly. It particularly has occurred with some of our 412 companion diagnostics. So one example is Roche made a drug for treating metastatic melanoma, and it only worked in a 413 414 subset of patients so they had a diagnostic test to identify 415 which patients should get the drug and which shouldn't. The 416 day they go on the market, there are 9 other labs who say we make the same test, in fact, some of them said they make a 417 418 better test. But the only clinical study, all that data,

419 Roche had it. They are the ones who had the drug, they did 420 the study. So those labs made these claims, they are saying 421 that, in fact, they have a better test, but there was no data 422 there to actually show it. Those are kind of the risks, and 423 even Roche has said this has created disincentives for them 424 to create new drugs that--for personalized medicine and have 425 companion diagnostics.

426 Mr. {Pitts.} While I do have some concerns about the 427 process by which FDA is proposing this new regulatory approach, patient groups have questioned whether there are 428 gaps in the current system that are jeopardizing patients' 429 430 safety. If that is the case, we must work together to 431 address them, and in your testimony, you cite several examples where FDA is aware of faulty or unproven LDTs. Can 432 433 you provide the committee with detailed descriptions of each 434 of the instances of harm you referenced, and any other 435 adverse event or anecdotal data FDA has compiled that forms 436 the basis for proposing this new regulatory framework? 437 Dr. {Shuren.} Yes, we can provide you with more details. I will say too, one of the challenges here is that 438 there is no requirement for reporting adverse events or 439

440 related malfunctions, so you don't have a surveillance system in place to even identify problems. Many of these have been 441 442 found because researchers looked at the data, the reports in scientific articles, whistleblowers have come forward, or 443 sometimes the labs have come to us. We have seen the data, 444 445 and, in fact, we were able to see, you know what, the data 446 isn't good, this test doesn't work. And that is just the tip 447 of the iceberg because we don't have a system in place to 448 actually identify problems.

One of the things we are proposing is have that system in place so we know when problems arise. This isn't bureaucratic, it is actually good medicine, so that if problems are there, we want to make sure they get fixed, and we are aware of it.

Mr. {Pitts.} You state on the one hand that all highrisk tests should be reviewed by the FDA, regardless of whether they are developed in a lab or manufactured as a kit. That may very well be necessary. You go on, however, to discuss that the Agency will continue to exercise enforcement discretion with respect to tests that do not have an FDAapproved equivalent. Are these consistent positions?

461 Dr. {Shuren.} So we are trying to strike a balance between assuring that there is availability of tests in cases 462 463 where there aren't tests, but to have some protections in place, some mitigations for the risks that occur in those 464 settings where you may not have a properly validated test 465 466 that we have been able to see to assure it is safe and 467 effective. On the same token, if you do now have an FDA-468 approved test on the market and you have another test for the 469 same intended use, then we should be reviewing it or go ahead 470 and use the test that has been proven to be safe and 471 effective. That is the balance that we tried to strike, and 472 our focus still is on those higher-risk devices, because the 473 low-risk devices we have said we are exercising enforcement discretion towards, regardless. All we ask is, tell us what 474 they are, and if there is a problem, report it, but other 475 476 requirements you do not need to comply with.

477 Mr. {Pitts.} My time has expired. I have a few follow-478 up questions on--with that question, but I will submit them 479 to you in writing.

480 Chair recognizes the Ranking Member, Mr. Pallone, 5481 minutes for questions.

482 Mr. {Pallone.} Thank you, Chairman Pitts.

Dr. Shuren, I want to start out with some basic 484 questions about FDA's role with respect to LDTs. I know you 485 described this in your testimony but I would just like to 486 hear more.

Some have questioned whether FDA has the authority to regulate LDTs in the first place. Specifically, they say that LDTs are not medical devices at all, instead, they assert LDTs are services that are offered in one place, making them more akin to a form of practice of medicine than to an article that can be sold in state commerce.

493 So, first, can you respond to this claim? Why does FDA 494 believe the Agency has the authority to regulate LDTs? 495 Dr. {Shuren.} Well, LDTs are in vitro diagnostics. 496 They are reagents, instruments or systems that are intended 497 to be used to diagnose a disease or other condition. And 498 essentially, at its core you have a process, you have 499 instructions for use for how you prepare a specimen from the 500 body, like blood, and then how you go ahead and examine and 501 analyze it to identify a particular substance in there that 502 then is linked to the diagnosis of a disease. And when you

503 make that test, those various components, the reagents, the 504 instruments, the device developer may not make those. They 505 may assemble them together, put them out, or they may tell 506 you what their instructions for use, their process, which 507 components to use. Labs do the same thing; they develop this 508 process which, by the way, is IP, they get patents on a lot 509 of these, and then they put together those reagents or those 510 instruments and assemble that device. And that is, in fact, 511 a device, and they have that in commercial distribution. 512 They are out there marketing those tests.

513 The law doesn't distinguish between who makes the test, 514 it is just if you make the test, if you make the device.

515 Mr. {Pallone.} All right.

Dr. {Shuren.} And as for regulating, even CMS has 516 517 recognized that LDTs are IVDs, they are subject to FDA 518 oversight. Even labs have come in for approval. I have to 519 tell you one lab, very vocal opponent, and they have orally 520 and in writing publicly stated they don't make IVDs, they 521 make services, but I have here their submission to the FDA in-house right now where they say here is our test, it is an 522 523 in vitro diagnostic test. They describe the method, the

524 process they made, and then they identify the various components that they don't make but they form part of the 525 526 test. Mr. {Pallone.} Okay. Well, let me follow up a little 527 bit about, you know, how traditional device manufacturers 528 529 differ from clinical labs with respect to LDTs. 530 The ACLA claims they are totally--they are 2 totally 531 different entities because manufacturers make and sell kits, 532 while labs design, validate, perform and interpret tests and furnish the results to physicians. And one question ACLA 533 raises in its testimony is how to define where the 534 535 manufacture ends and the performance begins. 536 So, again, I would like to know your response to that, specifically, what is the implication, significance and 537 538 relevance of that question for FDA regulatory purposes? 539 Dr. {Shuren.} Yeah, so we--I mean we define who is a 540 manufacturer that sits in our regulations, and essentially it 541 is a person who manufactures, prepares, propagates, 542 compounds, assembles or processes a device by chemical, physical, or biological or other procedure. They make the 543 test, they design the test, they develop the test. That is 544

545 the manufacturer. When they perform the test, they are 546 acting as more of a traditional lab. And a lab can do both, 547 and some only do the testing, some develop the test and they 548 do the--perform the test.

549 Mr. {Pallone.} All right, and then lastly, there has 550 been a lot of concern about whether a stronger FDA regulatory 551 stance with respect to LDTs might hinder the innovation that 552 has been flourishing in this area. And that is obviously 553 something we have to be concerned about.

554 Presumably, all sides would agree that there should be 555 enough oversight of tests to ensure that they are accurate 556 and clinically relevant, but the oversight should not be so 557 burdensome as to prevent or unnecessarily delay the 558 development of important new tests or the improvement of 559 existing tests. The difficulty, of course, is in achieving 560 that balance. Our second panel will have witnesses who 561 believe your guidance appears to achieve that balance, and 562 other witnesses who believe FDA is inherently the wrong agency to even attempt to achieve that balance. 563

564 So I would like to get your response to some of the 565 criticism that is being leveled at your whole approach. How

566 do you respond to claims that FDA's involvement will hinder 567 innovation? 568 Dr. {Shuren.} Well, our intent is try to strike the right balance. We have proposed a risk-based framework in 569 which we continue to exercise enforcement discretion for a 570 571 subset of LDTs to try to make them available, but the same 572 token, try to assure in other cases that we do have that 573 proper validation that those tests are safe and effective. 574 And the point for putting all of this out is, let us have 575 that dialogue. If what we are proposing doesn't hit the mark right, then let us talk about what is the best way to hit 576 577 that mark. Whatever we come up with, we are not going to satisfy everyone, I will tell you that. Whatever we get at 578 the end of the day, someone is not going to be happy because 579 there are so many different perspectives, but we are going to 580 581 try to hit it the best as we can. And the real solution is 582 we need the parties at the table, we need the lab community 583 to come in and talk to us, to hopefully move away from, you 584 don't have oversight for us, we don't want to talk, rather say, okay, we get it, let us figure out how to make this 585 586 work. Let us hit that right balance on innovation and safety

587 and effectiveness, the right balance on protect public health and promote public health. 588 589 Mr. {Pallone.} All right. I thank you for your response. And I just think it is clear, we need to have the 590 591 FDA overseeing these tests. 592 Thank you, Mr. Chairman. 593 Mr. {Pitts.} Chair thanks the gentleman. 594 Now recognize the Vice Chairman of the Subcommittee, Dr. 595 Burgess, 5 minutes for questions. 596 Dr. {Burgess.} Thanks, Mr. Chairman. Dr. Shuren, good to see you again. I am happy to hear you talk about a spirit 597 598 of openness and cooperation. I just find it curious that my 599 discussion with my own office staff and committee staff, 600 there was no outreach by the FDA to talk about this prior to 601 issuing the letter that you did at the end of July, 602 triggering the guidance that you are putting forward. So I 603 hope that perhaps you have just signaled a change in tone. I 604 hope there is the willingness to indeed work with many of us who are concerned about this, and clearly the concern exists, 605 you knew that because of the language that was in the FDA 606 reauthorization bill, and again, I just find it curious you 607

608 would not have had any discussion with committee staff prior 609 to issuing that notice about guidance. 610 Let me just underscore something that the chairman asked you. Will you provide our committee with all internal FDA 611 612 assessments of the harm that has been completed or were the 613 bases for the Agency's concern in this proposed framework? 614 Dr. {Shuren.} Well, we were asked if we could provide 615 details on those cases, and we will provide the details as 616 requested. 617 Dr. {Burgess.} But all internal documents that you have received at the FDA that formed the basis of this decision, 618 619 may you--may we look forward to you sharing those with us in 620 this new spirit of openness that you just proclaimed? Dr. {Shuren.} So let me go back and talk with people. 621 When you say all documents, if I have draft documents, we 622 623 usually try to move forward to things that are final and the 624 completed information. So we want to get you everything that 625 is right, and we will go ahead and do that. 626 Dr. {Burgess.} Well, specifically, we are looking at

627 how many of these tests are performed daily, what is the628 extent of the harm, have there been similar problems with FDA

629 approved and cleared kits, and then lastly and perhaps most importantly, do you believe physicians are not concerned 630 631 about patient harm? 632 Dr. {Shuren.} Right. 633 Dr. {Burgess.} So those would be the specifics that we 634 would be asking for. 635 Now, you know, we have kind of had these discussions 636 before, and I firmly believe the FDA lacks statutory 637 authority to regulate medical practice. Laboratory-developed tests are a service and not commercialized devices. 638 639 Do you have or did you rely on any legal opinion or memo 640 from FDA counsel, and if so, can you produce that legal 641 quidance for us? 642 Dr. {Shuren.} We did get guidance from legal counsel, and I will go back to them to see what materials we have or 643 644 able to provide. 645 Dr. {Burgess.} It is critical that, again, that 646 information be shared with us. 647 So let me ask you a question. In 30 days, we had asked for a notification 60 days prior to undergoing the guidance. 648 So you notified us at the end of July, so what is going to 649

650 happen in about 30 days, will the FDA be releasing guidance, 651 draft guidance, or regulation based on this framework? 652 Dr. {Shuren.} Our intent is to release draft guidance, to have a public process to get input on that, to have a 653 dialogue that includes not only an open public docket, public 654 655 meetings, opportunities to discuss in-person with us. We 656 want to have an open dialogue moving forward, and that is the 657 process. Very--658 Dr. {Burgess.} You--Dr. {Shuren.} --public, very collaborative. 659 Dr. {Burgess.} So the FDA is proposing to modify a 660 661 regulation through a guidance document. Regulation the FDA specifically indicated it would not regulate laboratory-662 developed tests, so where is the legal authority for this 663 664 discussion--decision? 665 Dr. {Shuren.} Actually, we have been consistent for 666 years that we do regulate LDTs. I mean if you have 667 statements that say that we don't have authority over LDTs, 668 that would be helpful to see. We have always said we have authority. We haven't enforced requirements. That is a 669 matter, that is a--decision on the part of the Agency, that 670

671 is enforcement discretion, and that is what we have done. We are not changing a particular regulation, we are not imposing 672 a requirement that isn't already imposed upon the labs, but 673 simply we have not been enforcing. 674 Dr. {Burgess.} Well, forgive me, but enforcement 675 676 discretion does not give me a warm fuzzy feeling, and it is 677 not just with this Administration, it was with the previous 678 Administration as well. We are all familiar with the 679 statement I am from the government, I am here to help. We are not going to bother you because we have enforcement 680 discretion, so we won't bother you up until the day that we 681 682 do. Most people find that as a very nebulous framework in which to work, and a very difficult framework in which to 683 684 plan, plan for the future and plan for expenses.

So how will this all work? Guidance should not, and the courts have determined does not, have the enforcement power of regulation, so how does the FDA intend to bring this framework upon the world and have it function without clear authority from Congress, and without providing the normal regulatory framework?

691 Mr. {Suren.} Well, again, there is authority under the

692 statute and that authority is there and it is applied now. 693 We haven't enforced it. And while this discussion isn't new, 694 you know, we have been talking about exercise--enforcing 695 those requirements in LDT as the existing requirement since the 1990's. We have been called upon by the Department of 696 697 Energy. We had 2 Secretary Advisory Committees, Secretary of 698 HHS, saying that we should be exercising our authority over 699 LDTs. The Institute of Medicine came back to say that. In 700 2007, we issued draft guidance withdrawing enforcement 701 discretion for a subset of LDTs, but the lab community came 702 back and said please don't do this piecemeal because that is 703 not predictability for us. Please instead put in place an 704 overarching framework. Seven years later, seven years later, 705 that is what we are doing, four years after we had a public meeting in 2010 to do this. This is no sudden change; this 706 707 is years. The question shouldn't be where did this come 708 from, the question should be, FDA, what the heck took you so 709 long.

710 Dr. {Burgess.} Mr. Chairman, I have additional 711 questions which I will submit for responses in writing, and 712 look forward to the speedy responses, and yield back.

713 Mr. {Pitts.} Chair thanks the gentleman.

Now recognize the gentleman from Georgia, Mr. Barrow, for questions. No questions? Who is next? The chair recognizes the gentleman from Virginia, Mr. Griffith, 5 minutes for questions.

718 Mr. {Griffith.} Thank you very much, Mr. Chairman. 719 I am going to follow up a little bit, although maybe a 720 little different than what Dr. Burgess was going after. And 721 I understand some of the concerns, but the Supreme Court has 722 held that an agency has a right to change its policy so long as it supplies a reasoned analysis for that change. An 723 724 agency, however, may not change its policies in a way that 725 simply disregards rules that are still on the books. FDA's 726 current regulations specifically exempt clinical labs from 727 medical device registration and listing requirements.

728 21 C.F.R. 807.65(i).

In an attempt to avoid directly conflicting with this regulatory exemption, the proposed guidance documents claim not to require a clinical laboratory to register and list their tests, but to create a new notification option where labs could notify the FDA of the types of LDTs they develop.

734 If, however, a lab does not submit a notification, it will then be subject to registration and listing requirements, 735 736 along with the related fees. 737 Now, it doesn't seem like there is a whole lot of choice 738 in there. So, Dr. Shuren, where in the statute does FDA 739 claim the authority to establish such a notification process? 740 Dr. {Shuren.} So they are subject--the labs are 741 currently subject to registration and listing. Our interests 742 for many of these is to know which are the LDTs out there so 743 we can use that information to then determine the risk 744 classification for them. We have offered as an option for 745 not complying to provide the notification. I will tell you the reason we did it. If you notify and you don't do, 746 instead, registrational listing, you are not subject to the 747 748 device tax. That is what we did, plain and simple. Mr. {Griffith.} Because there is a lot of pressure 749 750 regarding the medical device tax? 751 Dr. {Shuren.} No. We, in looking at this, said, you 752 know what, for a lot of these too, if we are not going to

754 going to be under enforcement discretion, we weren't going to

753

then subsequently actively regulate them, because they are

755 trigger all the other things that come with that. And that is what we tried to do, we were trying to give labs a break. 756 757 Mr. {Griffith.} If a lab fails to submit a notification 758 and is, therefore, subject to registration listing, how would this not directly conflict with the FDA's current 759 760 regulations? 761 Dr. {Shuren.} I am not aware that there is a conflict 762 with current regulations. 763 Mr. {Griffith.} You know, you indicated earlier, and I 764 thought this was kind of interesting based on some of the things I have read, that it is not a question of, and I am 765 766 paraphrasing a little bit, but it is not a question of do we, 767 but how we regulate, and yet by doing guidance, you are not 768 going through the normal administrative process active 769 procedures, and there is a lot of concern that folks won't be 770 able to get their input put into the Agency. 771 So if it is a question of do we--not do we, but how we--772 how do we regulate, shouldn't you be going through the APA? 773 Dr. {Shuren.} No. So, again, this is a general policy statement. These requirements already apply. They are 774 supposed to be complying with it. We are not enforcing those 775

776 requirements as a matter of policy. Making those changes, 777 the Administrative Procedures Act does not impose rulemaking 778 on those kinds of policies. 779 However, you raised the point about input, because notice and comment is about do I have the opportunity to 780 781 provide input. In rulemaking, notice and comment is, yes, 782 you can submit comments on the rule. In our guidance 783 document, you will be able to submit comments on the guidance 784 document. We will be holding a public meeting. We will have 785 opportunities in other venues to talk about this. There will be lots of opportunity for public discussion, for people to 786 787 get their viewpoints on the record or off the record. That 788 is what we will do so we can have a fully informed decision. 789 And we want to hear from people, so we ultimately hit this 790 right. 791 I do want to get back to you on that particular

792 regulation. The regulation provide--pertains to labs who are 793 using an FDA-approved test, not to labs when they are making 794 an FDA test. When they are making the test, they then become 795 a manufacturer. It triggers all the requirements. That is 796 what the regulation is about.

797 Mr. {Griffith.} I think there is some disagreement on that, and it clearly--it is clearly not what is stated in the 798 799 regulation. It just says clinical laboratories are exempt 800 under Part 807 as well, but anyway. 801 With that being said, Mr. Chairman, unless somebody else 802 would like my time, I will--well, Dr. Burgess, I yield to Dr. 803 Burgess. 804 Dr. {Burgess.} Does the gentleman yield for the last 805 few seconds? 806 Mr. {Griffith.} You got it. Dr. {Burgess.} Let me just ask you a question, Dr. 807 808 Shuren, as far as the scalability. I mean do you have the 809 personnel, the resources? We are constantly confronted 810 during the Cures Initiative discussions that the FDA is kind 811 of behind in its information architecture. Do you have the 812 personnel and the scalability to take on this vast new regime 813 that you are proposing? 814 Dr. {Shuren.} One of the reasons we proposed the long 815 phase-in was in part so that labs could have the time to get used to the framework. The second is taking into account our 816

817 resources so that we are not imposing these day one. The

818 phase-in on premarket review is over 9 years, so that we are 819 able to then identify based upon risk, calling in in segments 820 these particular tests those who would be subject to review, 821 and then there are a number that will still be under enforcement discretion, but those that would be--822 823 Dr. {Burgess.} Will you collect user fees from those 824 labs? 825 Dr. {Shuren.} For which ones? 826 Dr. {Burgess.} For the labs that you are now regulating 827 under guidance. 828 Dr. {Shuren.} So for the ones who come in in premarket 829 review, we actually have the authority to waive fees, and one 830 of the reasons is--was put into MDUFA III when we did this with the device industry was specifically for that purpose, 831 832 that if we exercised--we withdrew enforcement discretion on 833 labs during MDUFA III, we would have the ability not to 834 enforce user fees, but then the labs should be at the table 835 for those discussions. Now, we invited them to the table for 836 MDUFA III, they declined to come, but we would hope if we are moving forward then they would come to the table in MDUFA IV 837 838 and then let us talk about that, but for right now, we have

839 the ability to waive fees. Again, none of this starts until we are out with final guidance. We still have to get the 840 841 proposed guidance out, go through the public process, then final guidance, and then the first round for submissions 842 843 doesn't start until a year after that for premarket review. 844 Dr. {Burgess.} I yield back to the gentleman. 845 Mr. {Griffith.} And, Mr. Chairman, I would also ask--846 Dr. Burgess previously asked the question about legal 847 memorandums, and if we could have both in-house and outside 848 counsel memorandums if they exist. And I yield back. Mr. {Pitts.} The chair thanks the gentleman. 849 850 Now recognize the gentleman from Texas, Mr. Green, 5 851 minutes for questions. 852 Mr. {Green.} Thank you, Mr. Chairman. Again, welcome. 853 I understand the number of FDA cleared or approved tests 854 represents a small fraction of the tests relative to the 855 number of LDTs. Would you--do we know how many LDTs are 856 actually out there? 857 Dr. {Shuren.} We don't have an absolute number on

858 those, in part because there is no system on notification
859 where you put them in a database. We have estimates of what

860 we think are out there.

Mr. {Green.} Okay. Given the number of LDTs that are now the subject of premarket review under this proposed framework, how will FDA implement this proposal and will additional resources be needed?

865 Dr. {Shuren.} So, again, the phase-in was an attempt to 866 try to fold this in with the current resources that we 867 already have, and, again, during this time, tests remained 868 under enforcement discretion. So if it turned out, as we get a better lay of the landscape of what is out there, if we 869 need more time on implementation or for review, we can do 870 871 that, it is not going to put that lab to have to take that test off the market. And if it turns out there is a need on 872 additional resources, that is the kind of conversation we 873 874 have as a part of user fee reauthorization.

875 Mr. {Green.} I have heard that--

Dr. {Shuren.} And then there were discussions about legislation previously, and I do know when CMS looked at that bill, they thought that the cost for that would be about \$50 to \$100 million to implement, starting with \$20 million at the outset to create a duplicative bureaucracy. And that

isn't the best way of investing dollars or spending dollars, to simply rogue government and have duplicative oversight, and a costly one. So here we have experts already, we are leveraging them to do their kind of work they do every single day and they have been doing for decades, and now let us fold this in with the resources we have and if we need to address more, we will have those conversations--

888 Mr. {Green.} Okay.

899

889 Dr. {Shuren.} --and user fee discussions.

890 Mr. {Green.} Okay. I have heard the proposed framework would actually put the FDA in the business of regulating the 891 892 practice of medicine, since LDTs is a service rather than 893 medical device. How does FDA respond to this assertion and 894 what--at what point is LDT a medical device when it--when 895 does its use, interpretation, application and modification 896 become a service provided by a pathologist of physician on 897 behalf of a patient? What is the breaking point? 898 Dr. {Shuren.} Well, again, if they are making the test,

900 test, they have developed the process and they put it

all right, and that can be as a manufacturer assembling the

901 together then with reagents and instruments, and now they are

902 out there marketing it, they have made a test. When they are 903 running the test, they are performing the test, then they are 904 acting as a laboratory, then providing a service. That is 905 subject to oversight under CLIA. The FDA framework is 906 complimentary to assure the safety and effectiveness of the 907 tests that they use, whether that is made by someone else or 908 they make it themselves in the laboratory.

909 Mr. {Green.} Okay. Under the framework, will

910 professionals working in CLIA-regulated labs be treated as 911 both device manufacturers and users?

912 Dr. {Shuren.} So if they are making tests, then we would treat them as a manufacturer, keeping in mind that for 913 914 a variety of categories of LDTs, we are still exercising 915 enforcement discretion. So even though they make a test, 916 like a test for an unmet need, we are saying to them tell us what it is, report problems, but otherwise you don't have to 917 come in for premarket review, you don't have to put in place 918 919 quality systems, the kinds of controls to assure that when 920 you make a test, you make a high-quality test.

921 Mr. {Green.} But they are actually manufacturing it and922 using it, so does this framework create a duplicate system,

923 regulatory oversight between CLIA and FDA?

924 Dr. {Shuren.} No. We view these as complimentary. CMS 925 views them as complimentary. In fact, even when CLIA was passed in 1988, the then-administrator of what was the Health 926 Care Finance Administration, you know, former name for CMS, 927 928 Bill Roper even said CLIA is complimentary to what FDA does. 929 But we really need both. If labs are in the business of 930 acting as manufacturers and making tests, then there is 931 complimentary of FDA oversight to assure the tests are safe 932 and effective, and there is CLIA oversight to assure that the services that are performed by the laboratory are done at 933 934 high quality, that the people are appropriately trained. 935 Mr. {Green.} Well, the history of our committee, we have--sometimes have trouble for two agencies actually trying 936 937 to cooperate together, and sometimes it takes statute to do 938 it, but looking at the future of medicine, the importance of 939 innovation and effective diagnosis are impossible to 940 overestimate, and looking forward to working with the FDA, 941 the committee and the stakeholders to see that the regulatory 942 framework ensures patient safety while unleashing the potential for LDTs and diagnostics in general. So, you know, 943

944 discretion is important and the partnership between the two 945 agencies is really important and--because we don't want to 946 stop the success that we are seeing in that individual health 947 care. 948 Thank you, Mr. Chairman. I yield back. 949 Mr. {Pitts.} The chair thanks the gentleman. 950 Now recognize the gentleman from Illinois, Mr. Shimkus, 951 5 minutes for questions. 952 Mr. {Shimkus.} Thank you, Mr. Chairman. It is great to be here. Dr. Shuren, welcome. 953 954 Just on a side, we--over the break, we had a 21st 955 Century Cures panel hearing in the State Capitol of 956 Springfield. It just went phenomenal. I think there is a 957 lot of excitement on both sides and in the health care 958 communities, and I hope we can keep moving forward, and I know this isn't really a--specifically about that, but there 959 960 is a new era coming in health care delivery and the like, and 961 I am--I just wanted to report back that that was a very 962 productive hearing we had this June. So, Dr. Shuren, again, welcome. Under the practice of 963

964 laboratory medicine, CLIA requires disclosure of known

965 information relevant to use of a test by a certified laboratory to a treating physician, without regard to, and I 966 quote, ``labeling claims.'' This proactive approach to 967 968 dissemination of information by a clinical laboratory may be in consistent with the restriction on dissemination of 969 970 information by a medical device manufacturer under FDA 971 regulation. 972 How would FDA manage conflicting requirements governing 973 consultations with physicians about patient test results? 974 Dr. {Shuren.} So we don't view that as in conflict because the labs can have those kind of communications. 975 That 976 does not run afoul of the Food, Drug and Cosmetic Act. 977 The issue becomes if they are out there promoting, they 978 are marketing I have this test that I can perform, and if 979 they are marketing it in a case where they should have come 980 in for review, they need to come in for review, but they can 981 have those discussions with treating physician--treating 982 physician can ask them to run a test in an off-label fashion. 983 That is fine, that is not inconsistent with our program. 984 Mr. {Shimkus.} What types of diagnosis--diagnostic or patient treatment claims--well, I think you have kind of--985

986 would be permissible, and what kinds of evidence would be 987 required by the FDA? 988 Dr. {Shuren.} Yeah, so in terms of, you know, permissible, one would be permissible without coming to the 989 FDA, and we have kind of mentioned, well, first of all, the 990 991 low-risk tests you don't come in anyway, and we have said we 992 are exercising enforcement discretion for a number of the 993 requirements. For rare diseases, we are continuing to 994 exercise enforcement discretions. You don't come into us, 995 where otherwise a conventional manufacturer would have to 996 come into us. And even if there is an approved test for a 997 rare disease, we are still saying you don't have to come into 998 us. 999 If you are making a test where there is no FDA-approved

or cleared test, you can go ahead and do that until the point where there is an FDA-approved test. Now, we have a mitigation in place which is a lab and a health care facility where you are treating that patient, or within that health care system, because you have a shared accountability for both testing the patient and treating the patient. That is the mitigation we have put in place because here, we don't

1007 have that independent validation the test is actually safe 1008 and effective, and that is a balance we have tried to put in. 1009 But then in other cases where, for example, we have an FDA-1010 approved test, if you want to continue to market as such a 1011 test, you would come in the door, much like the other 1012 manufacturer, to show you are safe and effective, because at 1013 that point, we have a test we know which works. That is in 1014 the best interests of patients to use it. If you have one 1015 that is good, or you think you have one better, then provide 1016 the data to show you are better because you may not be, and 1017 if you are not, that hurts patients because doctors and 1018 patients can go, it is a better test, I will use that one, in 1019 fact, it may not be.

Mr. {Shimkus.} Great. On the medical device quality system regulation requirements would apply upon filling of a premarket submission with the Agency, but the draft guidance does not adequately tell clinical laboratories how to comply. As one example, what constitutes a malfunction of a finished device if the test is an LDT?

1026 Dr. {Shuren.} So a malfunction is where the test does 1027 not meet its performance specification, or it doesn't perform

1028 as intended. That is a malfunction, and that has applied for 1029 IVDs, and we have information about that. 1030 Now, I will say in terms of the application of quality 1031 systems, we have been working with the Clinical and 1032 Laboratory Standards Institute on developing education 1033 modules about how quality systems would apply to 1034 laboratories, and to get that out there for better training 1035 for the labs so they have information, they have people who 1036 will have training programs with them, we will get feedback 1037 on that. If people feel they need more information, we will 1038 work with the lab community on what they need to be 1039 successful, but we will have more information that is out 1040 there. 1041 Mr. {Shimkus.} I thank you for your time. 1042 And, Chairman, I yield back. 1043 Mr. {Pitts.} The chair thanks the gentleman. 1044 Now recognizes the gentlelady, Ms. Schakowsky, 5 minutes 1045 for questions. 1046 Ms. {Schakowsky.} Thank you, Mr. Chairman. And I 1047 apologize, Dr. Shuren, that I just arrived from another 1048 meeting, but I did want to ask you an important question.

1049 CMS, obviously, could not be here today to participate 1050 in this hearing, and I think it is unfortunate because much has been made of the role that CMS plays in overseeing LDTs 1051 1052 under the authority provided by the Clinical Laboratory 1053 Improvement Amendment. To be sure, CMS plays a critical role in regulating laboratory practice in this country, but I 1054 1055 think we need to be clear about the limitations of that role 1056 as well. 1057 So I have a document that I obtained from the CMS Web 1058 site. It is entitled CLA--CLIA Overview, and it contains 1059 CMS's responses to several frequently asked questions, and I

1060 would like, Mr. Chairman, unanimous consent to enter this

1061 document into the record.

1062 Mr. {Pitts.} Without objection, so ordered.

1063 [The information follows:]

Ι

1065 Ms. {Schakowsky.} So let me refer to a couple of excerpts that appear to explain the difference between the 1066 1067 roles that CMS and FDA play with respect to LDTs. 1068 First, this document states, ``when a laboratory 1069 develops a system--a test system such as an LDT in-house 1070 without receiving FDA clearance or approval, CLIA prohibits 1071 the release of any test results prior to the laboratory 1072 establishing certain performance characteristics relating to 1073 analytic validity for the use of that test system in the 1074 laboratory's own environment. This analytic validation is limited, however, to the specific conditions, staff equipment 1075 1076 and patient population of the particular laboratory. So the 1077 finding of these laboratory-specific analytic validation are 1078 not meaningful outside of the laboratory that did the 1079 analysis. Furthermore, the laboratory's analytic validation of LDTs is reviewed during its routine biannual survey after 1080 1081 the laboratory has already started testing.'' And it goes on 1082 to describe the FDA's role. In contrast, the FDA's review of 1083 analytic validity is done prior to the marketing of the test system and, therefore, prior to the use of the test system on 1084

1085 patient specimens in the clinical diagnosis/treatment

1086 context. Moreover, FDA's premarket clearance and approval

1087 process assess the analytic validity of the test system in

1088 greater depth and scope. The FDA's processes also assess

1089 clinical validity.

1090 According to this document, CMS does not assess clinical 1091 validity. So let me ask you this. Here is the question. 1092 Can you please describe the difference between CMS's review 1093 of analytic validity and the FDA's review of clinical

1094 validity?

Dr. {Shuren.} So for analytical validity, we dive into the data to make sure that, in fact, you have demonstrated there is analytical validity. And just so folks know, what you are doing there, it is the accuracy of measuring something in a human specimen. So let us say measuring protein in the blood. So we do a deep dive into that to make sure, in fact, that validation was accurate.

1102 In CLIA, it is a much lighter look. In some cases, it 1103 is a checklist to make sure you have it, or maybe a sampling 1104 of the analytical validity that has been done, not of all the 1105 tests.

1106 Ms. {Schakowsky.} But--

1107 Dr. {Shuren.} And clinical validity is then the 1108 association of that--what you measure in the body with a 1109 disease, so that you, in fact, are making a diagnosis. This 1110 protein, if we find one of these markers, means you have this 1111 disease. CLIA doesn't have that. We have that to make sure 1112 then when you do the test, and people are doing a test to 1113 make a diagnosis, that, in fact, it is accurate in making 1114 that diagnosis. And, you know, the Web site for CMS also 1115 says as a result--and this is talking just about analytical 1116 validity, as a result, FDA review may uncover errors in test 1117 design or other problems with a test system. Errors that 1118 will not be found under the CLIA system. Again, they are 1119 complimentary.

Ms. {Schakowsky.} So I just have a couple of--so how do you plan to coordinate then with CMS to make sure that, you know, we are getting the best data?

Dr. {Shuren.} Yeah, so we already work with CMS. We have a very close relationship. We are part of the CLIA program. When you--they talk about, you know, to make an LDT you have to be in a high complexity lab, you know, we make

1127 those determinations too regarding complexity. We make the 1128 determination on a waiver for complexity if they want to do 1129 some of these lower-risk tests. And in developing this 1130 framework, we have been in discussions with CMS. When we 1131 look at quality systems, we are in discussions with them too 1132 because there is a little bit of overlap--

1133 Ms. {Schakowsky.} Um-hum.

1134 Dr. {Shuren.} -- and our plan is not to duplicate those 1135 requirements, it is to just go with the pieces that are 1136 complimentary. What we are doing with CLSI is also to focus 1137 on the parts that are different, not to sort of talk about 1138 the things that you may already be covering on CLIA, and then we don't need to touch that. In fact, we have proposed--we 1139 1140 would propose to have the option for a third party review 1141 model for both moderate risk tests and for inspections, for 1142 audits. And we know some of the CLIA auditors are interested 1143 in being accredited by FDA to do those reviews, and to 1144 actually, when they are in the lab, to go look at it for CLIA 1145 to be able to do the additional look for FDA to try to 1146 minimize any disruption with the labs, and to work with those entities that they are already accustomed to working with. 1147

1148 Ms. {Schakowsky.} Thank you for that clarification. 1149 Appreciate it. 1150 Mr. {Pitts.} Chair thanks the gentlelady. 1151 Now recognize the gentlelady from North Carolina, Mrs. 1152 Ellmers, 5 minutes for questions. 1153 Mrs. {Ellmers.} Thank you, Mr. Chairman, and thank you, 1154 Dr. Shuren, for being with us today. 1155 I just want to go back and kind of clarify some of the 1156 comments that -- the responses that you have given to some of 1157 the questions, because I--as this is going along, I am 1158 getting a little confused as to what the whole process is and 1159 why we are approaching this, or why the FDA has taken this 1160 approach. 1161 One, I want to go back to the user fees and the medical 1162 device tax. Now, my understanding is, from what you have said, that the FDA has no intention of putting a tax on these 1163 1164 lab tests, is that correct? 1165 Dr. {Shuren.} Well, and just to clarify, we don't 1166 handle the medical device tax. We have nothing to do with 1167 it. 1168 Mrs. {Ellmers.} But--

1169 Dr. {Shuren.} The trigger is registration and listing 1170 of that device then triggers--1171 Mrs. {Ellmers.} Okay, so--1172 Dr. {Shuren.} --the device tax. Mrs. {Ellmers.} --the part that the FDA would play does 1173 1174 not intend, can you definitively give us an answer today that 1175 this will not be an item that will be taxed by the, you know, 1176 for the American people? 1177 Dr. {Shuren.} So some of the tests and labs would be 1178 taxed if they are making a test that then has to come in for premarket review. If they opt for doing that, at that point 1179 1180 then they would move over to register and list with us, 1181 because we have requirements--it is the registration and 1182 listing that then is the trigger for some of the other 1183 requirements. 1184 Mrs. {Ellmers.} So then this is open-ended? So this 1185 is--these tests can be taxed? 1186 Dr. {Shuren.} If they are in--if they are the tests 1187 that have to come in for FDA--1188 Mrs. {Ellmers.} And they are not presently being taxed? Dr. {Shuren.} They are not presently being taxed. 1189

1190 Mrs. {Ellmers.} But they can in the future.

1191 Dr. {Shuren.} They can in the future.

1192 Mrs. {Ellmers.} Okay, that is a good clarification 1193 right there.

Now, we talked a little bit about user fees as well between some of the labs that are being regulated. Can you just--and there again, I would just like to have you go back and discuss what you have already said, but I just need clarification.

Dr. {Shuren.} Certainly. If the--our framework were to be implemented during the course of MDUFA III, we would not impose any user fees. We would waive those user fees. We have those--that authority to do that.

1203 Mrs. {Ellmers.} Now, you have the authority--

1204 Dr. {Shuren.} Right.

1205 Mrs. {Ellmers.} --but you can't say definitively today 1206 that that is not going to happen, correct? I mean--

1207 Dr. {Shuren.} That--

Mrs. {Ellmers.} --that could be changed at any moment.
You could--the FDA could decide tomorrow that now we are
going to institute user fees.

1211 Dr. {Shuren.} If the framework in place--yes, if people 1212 change their mind, but that is actually why we had expanded 1213 the waiver provision. That is--it was intentionally put in. 1214 Now, for MDUFA IV, we would like to have the labs at the 1215 table to have that discussion, like we invited them for MDUFA 1216 III, come to the table in MDUFA IV and then talk about--

1217 Mrs. {Ellmers.} Um-hum.

1218 Dr. {Shuren.} --user fees. Should they apply, what 1219 should they look like, that is the discussion to have, just 1220 as we have with other device developers.

Mrs. {Ellmers.} I want to go back again to, you know, kind of the--where the origin of all this came from. My understanding is you have stated in your testimony and in discussion that FDA has always had this ability to put this forward, but has not in the past and now has determined to do so, is that correct?

1227 Dr. {Shuren.} Yes, we have the authority over LDTs, and 1228 subject to those requirements, we haven't enforced it.

1229 Mrs. {Ellmers.} And what--I mean where did that come 1230 from, what statute, when and, you know, when did it become 1231 part of your--the ability for the FDA to institute this?

1232 What--can you go back, give us a date, a time, a rule, a--1233 Dr. {Shuren.} So 1976, the law was changed to give us 1234 oversight on in vitro diagnostics. It is agnostic as to who 1235 makes it. That is the FDA law. It doesn't distinguish 1236 between who makes the test, it is if you make the in vitro 1237 diagnostic, that is where we have the authority. When CLIA 1238 was passed in 1988, which, remember, was an amendment to a 1239 1967 law that put in all the licensing structure, that didn't 1240 change. Nothing that was changed in the law, there is 1241 nothing there on the legislative history, that authority for 1242 FDA simply persisted. Mrs. {Ellmers.} Okay, now, what has changed now--1243

1244 Dr. {Shuren.} And even recognized by CMS when the law 1245 was passed.

1246 Mrs. {Ellmers.} And what has changed now that has 1247 caused the FDA to now look at this as something that needs to 1248 be implemented?

Dr. {Shuren.} Yeah, and keep in mind, we have been looking at this for years. We have had these discussions, you know, starting in the 1990's, and even started taking steps in 2007 with the draft guidance to withdraw enforcement

1253 discretion for a subset of LDTs, and again, we heard from the 1254 lab community, don't do it piecemeal, do an overarching 1255 framework. Why we have done, it is because the tests have 1256 changed. I mean years ago, these were very simple tests. 1257 They tended to be rare conditions, they were used locally. 1258 There were really within a facility and a treating physician, 1259 and you have the laboratory. Today, we have increasingly 1260 more complex and sophisticated tests, higher-risk tests, 1261 being used for common diseases, being used nationally, 1262 increasingly doctors and patients relying on the results of that test, and then examples of faulty LDTs. That has been 1263 1264 the push, and the push doesn't just come from us, it is from 1265 outside bodies.

1266 Mrs. {Ellmers.} Can you cite for the committee or 1267 provide--I realize you probably can't do that right--at this 1268 very moment, can you give the committee those tests that have 1269 shown inaccuracies that you feel that the FDA needs to 1270 address this issue as tests have been innovated, and 1271 obviously you are seeing something that is indicating that we 1272 need to implement more regulation, and I would just like for you, if you could, to provide for the committee what those 1273

1274	tests are that you feel are beingor are coming up with
1275	inaccurate results.
1276	Dr. {Shuren.} Weyes, we will do that.
1277	Mrs. {Ellmers.} Thank you. Thank you.
1278	And I apologize, Mr. Chairman, I went over on my time,
1279	but, yes, if you could provide the committee with that, that
1280	would be wonderful. Thank you.
1281	Mr. {Pitts.} The chair thanks the gentlelady.
1282	Now recognize the gentleman from Florida, Mr. Bilirakis,
1283	5 minutes for questions.
1284	Mr. {Bilirakis.} Thank you, Mr. Chairman. I appreciate
1285	it very much.
1286	During the August recess, I held two 21st Century Cures
1287	Roundtables in my district, and I heard from patients and
1288	some of their problems. I also heard from providers and some
1289	of their problems. There were two themes that came up;
1290	outdated payment policies and also the barriers to
1291	innovation. I am glad that we are holding this hearing today
1292	because the specific issue of FDA regulations of labs develop
1293	tests was one of these issues that came up. We had a company
1294	talk about their concerns that the FDA's regulations could

1295 slow innovation.

At the end of the day, we want safety, of course, but we also want to keep innovation products to get to the market. If we don't, then the patients, in my opinion, will suffer. Dr. Suren, I have a couple of questions. Has FDA done a thorough economic analysis that considers the direct cost to laboratories and taxpayers if FDA goes through their--through with their guidance?

Dr. {Shuren.} So we don't have a formal economic analysis. On the other hand, we also hear from labs who say, well, when we make tests, we validate them. CLIA says they should--they are supposed to be validating those tests when we--they make them or they modify them. And so if that is the case and they have that data, the cost should be a lot less to be able to then provide that to us.

1310 Mr. {Bilirakis.} Thank you. Under the Regulatory 1311 Flexibility Act, the RFA, federal agencies are required to 1312 assess the impact of their regulations on small businesses. 1313 The analysis should include such things as how many small 1314 businesses there are, the projected reporting, recordkeeping 1315 and other compliance requirements of the proposed rules, any

1316 significant alternatives to the rule that would accomplish 1317 the statutory objectives while minimizing the impact on small entities, and it requires agencies to ensure that small 1318 1319 businesses have the opportunity to participate in the 1320 rulemaking process. However, if FDA goes forward with 1321 guidance and not formal rulemaking, it undermines laws that 1322 protect due process, such as the RFA or the Administrative 1323 Procedures Act. 1324 Will the FDA go through with the traditional process of 1325 rulemaking? Dr. {Shuren.} No, because this is a policy of 1326 1327 enforcement discretion. The requirements are already there. 1328 They are subject to the requirements. We are not imposing 1329 that. We have, as a matter of policy, decided not to enforce 1330 We are now changing that policy and enforcing them. requirements in certain cases. Those general policy 1331 statements under the Administrative Procedures Act are not 1332 subject to rulemaking, and actually have significant impact 1333 1334 if they are for our ability to do so. However, as part of 1335 the process with guidance, there is a public process for small businesses and others to weigh in, not only on the 1336

1337 docket and written comments with public meeting, we will have 1338 meetings that are occurring in other venues and other 1339 discussions. Some groups have already been in talking with 1340 us about the framework, and we will have that dialogue. What 1341 we hope is though is that people will come and talk to us, 1342 that the lab community will be in the door and have those 1343 conversations. Some have. We would like to see the full 1344 community come in the door, not talk about we provide 1345 services, these aren't IVDs, don't regulate us, but rather 1346 come and say, okay, we get it, but let us figure out how to 1347 do this right because we think labs developing tests is a 1348 good thing. We are not here to stop that, we are here to 1349 have--try to have that balance between the development of new 1350 tests, but also tests that work, making sure it is safe and 1351 effective, because there is no value to doctors and patients if the test doesn't work. That hurts people and that is a 1352 1353 cost on our health care system.

Mr. {Bilirakis.} The--how many labs would suddenly fall under the FDA authority under the proposed guidance? Dr. {Shuren.} In part, we will see that with notification. We are estimating that that number--we know

1358 for the labs who can make LDTs, who are allowed to, according 1359 to CMS that number is 6,000, but not all of them make LDTs. 1360 That number is much smaller. And we think a number of these 1361 LDTs are also subject to the continued enforcement 1362 discretion. So for some of these labs that are making tests 1363 that, again, they are not coming in the door for us. 1364 Mr. {Bilirakis.} I believe this was mentioned earlier, 1365 but I will ask the guestion again. I have heard concerns 1366 that some of the guidance that FDA issues may be duplicative 1367 or contradictory with the requirements of--under CLIA. Will FDA ensure that its guidance will harmonize with the current 1368 regulations required under CLIA? 1369 1370 Dr. {Shuren.} Yes, and in developing our framework and other materials, we have been coordinating with CMS. Our 1371 1372 qoal is not to be duplicative. Mr. {Bilirakis.} Thank you very much. 1373 I yield back, Mr. Chairman. 1374 1375 Mr. {Pitts.} The chair thanks the gentleman. 1376 And now recognizes the ranking member of the full 1377 committee, the gentleman from California, Mr. Waxman, 5 minutes for questions. 1378

1379 Mr. {Waxman.} Well, thank you very much, Mr. Chairman. 1380 Dr. Shuren, one of the themes of the 21st Century Cures Initiative has been that advances in molecular medicine and 1381 1382 information technology will enable the use of smaller, more 1383 efficient clinical trials and faster development of new 1384 cures. For those improvements to be realized, we will need 1385 to rely on increasingly sophisticated tests that can both 1386 accurately analyze the genetic and molecular properties of 1387 diseases as expressed in individuals, and recommend treatment 1388 regimens based on those analyses. Thus, these sophisticated 1389 tests appear to be central to what the 21st Century Cures 1390 Initiatives is all about.

1391 Could you describe for us the kind of genomic and other 1392 sophisticated tests that are in existence or under 1393 development that are aimed at helping to guide clinical 1394 decisions, and can you tell us what role they play or hope to 1395 play in developing and improving treatments, and can you 1396 explain what FDA's role was or will be in their development 1397 and use?

1398 Dr. {Shuren.} Okay. So increasingly, we are seeing 1399 tests to identify those patients who would benefit from

1400 particular therapies and those who would not, so that you are 1401 not giving a treatment and exposing that person to side-1402 effects when they are not going to get a benefit in return. 1403 And we see this a lot in cancer, we are seeing it in some 1404 other fields as well.

1405 Getting the right treatment to the right patient depends 1406 upon having accurate and reliable test results. If they are 1407 not, that is where mistakes happen, and that is what has 1408 happened with people who didn't get treatment who shouldn't. 1409 So tests that were there for breast cancer had high false 1410 negatives, so people were being told the treatment that is 1411 available, you are not a candidate for, when, in fact, they 1412 would have been a candidate. We heard earlier about, you 1413 know, Oversure where one of the treatments is having surgery 1414 because if you have ovarian cancer, have it taken out. And 1415 you had examples where a woman didn't have cancer, had the 1416 surgery, woman who had cancer told not, didn't have the 1417 treatment when they should have had treatment at that point. 1418 And we see it even in heart disease. So there is a case of a 1419 test for risk of heart disease, and then the use of statins-responsive to statins. Well, it turns out--we wound up 1420

1421 seeing the data on this, and there was a subsequent study 1422 that showed these markers didn't actually predict it. The 1423 test was not valid, didn't do it, but at the time when that 1424 data was there, over 150,000 people got tested. We estimate 1425 the cost may be over \$2 billion. Even Eric Topol, who many 1426 of you were talking about with personalized medicine and some 1427 of the work there, he actually talked about that this was a 1428 great example. Going forward, this story should serve as a 1429 valuable reminder of the potential pitfalls present in 1430 prematurely adopting a genomic test without sufficient 1431 evidence.

1432 Mr. {Waxman.} Well, on the next panel, Mr. Mertz, from 1433 the American Clinical Lab Association, will testify that if 1434 there were problems with LDTs, we would have more publicity 1435 about them. Besides the 2008 statement by the Advisory 1436 Committee on Genetics, Health and Society that there have 1437 been a few--been few documented cases in which patients 1438 experienced harm because of errors in a CLIA-regulated 1439 genetic test.

1440Do you agree with that, would doctors and patients1441necessarily know if tests weren't giving good advice for

1442 clinical decisions? Your testimony mentions some of these, 1443 but please describe any examples of the risks or harms of 1444 LDTs that have led FDA to change its enforcement policy in 1445 this area.

Dr. {Shuren.} Yeah. So doctors and patients wouldn't know. I mean you order a test, you don't know it is FDA approved or it is not FDA approved. That is the state of affairs. And so you don't know if you have those guarantees or not. That is the way things are today. And, of course, you are relying on those test results then for making a decision on how to care for the patient.

1453 Mr. {Waxman.} Well, CLIA regulates the labs. If CLIA 1454 regulates the labs, should we rest assured that the tests 1455 from that lab will be accurate?

Dr. {Shuren.} No. CLIA doesn't--CLIA's purpose is not to assure the tests are safe and effective. CMS recognizes that too and has noted distinctions between what FDA does and what CMS does. They are complimentary systems, and in going forward, we need to make sure we are coordinated and we avoid any duplication, but they are complimentary systems. And, you know, the Secretary's Advisory Committee did note, yes,

there were a few reports of problems because there isn't a 1463 1464 system there for identifying those problems. That is one of 1465 the things that we would put in place, but that same 1466 committee, that same Advisory Council, also said the absence of evidence doesn't mean that there is an absence of a 1467 1468 problem. In--and, in fact, they came back and said we 1469 recommend the FDA begin enforcing requirements for LDTs. 1470 That was their conclusion. 1471 Mr. {Waxman.} So even though we know it is a decent 1472 lab, they live up with the good standards, we don't know if 1473 the result of the test is going to be accurate in helping the 1474 patients or not? 1475 Dr. {Shuren.} Right. We have for--1476 Mr. {Waxman.} May even do them harm. 1477 Dr. {Shuren.} Right, and we had for H1N1, so when that 1478 came out, by the way, the original samples came from China. Only the CDC had them. And then when the emergency was 1479 1480 declared, CDC had developed a test and we approved their--1481 gave them an EUA within days. Then they made the samples 1482 available to other labs. The labs who developed things beforehand had no access to the H1N1 samples, and then they 1483

1484 came in the door. Now, we cleared--we gave EUA authority to 1485 some of the labs--1486 Mr. {Waxman.} EUA is--1487 Dr. {Shuren.} --but some of them--1488 Mr. {Waxman.} EUA is? 1489 Dr. {Shuren.} I am sorry, emergency use authorization, 1490 in the setting of that pandemic. But some of the labs, their 1491 data and from pretty prestigious academic institutions, their 1492 tests were problematic. And we saw the data, that is how we 1493 know, and then they weren't out there on the market. That is what FDA does, but again, we are trying to strike that right 1494 1495 balance in innovation, access, and safety and effectiveness. 1496 Mr. {Waxman.} Thank you. 1497 Thank you, Mr. Chairman. 1498 Mr. {Pitts.} Chair thanks the gentleman. 1499 And now recognizes the vice chairman of the full 1500 committee, the gentlelady from Tennessee, Mrs. Blackburn, 5 1501 minutes for questions. 1502 Mrs. {Blackburn.} Thank you, Mr. Chairman. And I 1503 appreciate the emphasis that we have on 21st Century Cures, and the opportunity for all of us to visit with you, Dr. 1504

1505 Shuren, and we thank you for your time and for being willing 1506 to come over here and talk with us and answer the questions. 1507 I think that we are all interested in solving access issues 1508 for our constituents, and part of that being preserving 1509 access to affordable health care for all Americans. And 1510 right now the cost of health care seems to be going through 1511 the roof, and we hear about it every day.

1512 Let us go back and talk a little bit about the guidance 1513 document. I know Mrs. Ellmers and Mr. Bilirakis have both 1514 touched on is with you, and when you are looking at the 1515 quidance document and the LDT issue, you know that there 1516 could be numerous requirements that could be put in place 1517 from your guidance document. We know that you all contend 1518 that guidance documents are not binding on the issue--on the 1519 industry.

Now, when we are out there talking with some of our innovators, and talking with those that are trying to work through the process with you all, what we hear is, well, they might not do something, but they could, and the uncertainty that exists in that. So how do you, you know, as we talk about answering the questions for constituents, how do you

1526 reconcile that difference, you might not but you could, and 1527 the guidance documents aren't binding? So how do you 1528 reconcile that? 1529 Dr. {Shuren.} So just to flip around in this case, here we are talking about the requirements to comply with the 1530 1531 Food, Drug and Cosmetic Act are already in place for the 1532 labs. We have chosen not to enforce those requirements. We 1533 haven't taken action for the people who aren't meeting it, 1534 for the most part, but that is the change that we are making. 1535 So unlike in other cases where it is--we are imposing a 1536 requirement, we are reinterpreting that requirement under the 1537 law, we are not doing that here, we are simply withdrawing 1538 enforcement discretion, saying here are the requirements, 1539 they are already on the books, there are regulations about 1540 them, some cases there are guidances, and you would meet that 1541 just like you would as a conventional manufacturer, but we 1542 maintain enforcement discretion still in some cases where we 1543 say these particular requirements, as outlined here, you 1544 don't have to comply with, we will not enforce those. 1545 Mrs. {Blackburn.} Yeah, and, you know, I appreciate 1546 that and I appreciated your comments about the medical device

1547 tax, and you and I have talked about the Software Act and the 1548 medical apps that are there, but I just want to highlight 1549 with you again that sometimes that discretion, that 1550 uncertainty is very difficult for many that are innovating in 1551 that space because they know you might not do something, you 1552 probably won't do something right now, but it doesn't state 1553 what you are going to do if you changed your mind. And as 1554 they look at federal agencies, you all included, mission 1555 creep is something that is--that they are concerned about, 1556 and also lack of economic analysis. So I would just--I would 1557 highlight that to you.

1558 Let me go back to something Mr. Griffith raised earlier. 1559 In addition to Section 807.65(i) of the federal regulations which specifically list clinical labs as a class of entity 1560 1561 that is exempt from establishment registration and device 1562 listing, the preamble to these final regulations implementing 1563 the registration requirement unequivocally emphasizes this 1564 point in stating the commissioner believes that full-service 1565 labs and similar establishments are exempted from 1566 registration. Were you aware of these regulatory provisions currently on the books? 1567

1568 Dr. {Shuren.} Yeah, so this provision pertains to labs 1569 when they are using tests. It does not pertain to when they 1570 are manufacturing--1571 Mrs. {Blackburn.} Okay. 1572 Dr. {Shuren.} --tests. That is the distinction. And I 1573 also, you know, am sympathetic, I understand the 1574 predictability when people say, well, if you put a policy in 1575 place, and here people are saying when you exercise 1576 enforcement discretion, what about, you know, you could take 1577 it away tomorrow. This should be a poster child about our taking away enforcement discretion. We have been at it for 1578 years. I was a very young man when this started back in the 1579 1580 1990's. I now have gray hair. So it does not happen 1581 overnight. In some respects, I hate to say it, I wish it 1582 would. I would probably be--not have the gray hair. 1583 Mrs. {Blackburn.} Well, we are--I think we all end up 1584 having gray hair. It is one of the blessings that comes our 1585 way from being able to solve problems and work through issues 1586 that affect all Americans, and we look for a good resolution 1587 to those, and I hope that you are going to commit to work with us on the software component, the medical apps and 1588

1589 keeping these free of the medical device tax. We have got a 1590 lot of people that are looking to expand access, and that is 1591 a good way to do it. 1592 I yield back. 1593 Mr. {Pitts.} The chair thanks the gentlelady. 1594 Now the chair recognizes the gentlelady from California, 1595 Ms. Eshoo, 5 minutes for questions. 1596 Ms. {Eshoo.} Thank you, Mr. Chairman. I appreciate the 1597 legislative courtesy. While no longer a member of this 1598 subcommittee, the committee rules do allow members of the full committee to participate, and I appreciate it. 1599 I have a statement that I would like to submit for the 1600 1601 record, and ask unanimous consent to do so. 1602 Mr. {Pitts.} I am sorry, I didn't hear you. Ms. {Eshoo.} Yeah, I just ask--1603 Mr. {Pitts.} I am trying to get those--1604 Ms. {Eshoo.} You mean you weren't paying--1605 1606 Mr. {Pitts.} --Klieg lights turned off. 1607 Ms. {Eshoo.} You weren't paying attention to me, Mr. 1608 Chairman. No, I just asked unanimous consent to produce a 1609 statement into the record today.

- 1610 Mr. {Pitts.} Without objection--
- 1611 Ms. {Eshoo.} Thank you very much.
- 1612 Mr. {Pitts.} --so ordered.
- 1613 [The prepared statement of Ms. Eshoo follows:]

1615 Ms. {Eshoo.} Dr. Shuren, it is good to see you, as 1616 always.

1617 I think, you know, the benefit of sitting here and 1618 listening to all the questions and your responses is the 1619 following. When I go to either Stanford University or the 1620 Palo Alto Medical Foundation, part of all of these exams, and 1621 if there need to be further examination of things, are tests. 1622 I want my tests to be accurate. I want my tests to be 1623 accurate, and I think every single one of us do too. And I 1624 think that we are at a juncture today where we should be 1625 celebrating something, and that is that there has been so much innovation that has moved forward relative to 1626 1627 diagnostics, they are far more sophisticated, we have a 1628 broader and greater capacity to make determinations relative 1629 to diseases that were at one time a death sentence and today 1630 can be manageable if, in fact, there is a correct diagnosis. 1631 And so these tests are really central in all of our lives, and I think that, speaking for myself, the older I get, I 1632 1633 can't wait for the results of the tests to come back to know that everything is all right, but we depend on accuracy. And 1634

1635 I think that the FDA, in terms of its role, a key role is to 1636 ensure safety and efficacy of drugs and devices. 1637 This is really more of discussion of how this is going 1638 to work. I know that there is a question that has been 1639 raised about whether the Agency has the authority. It seems 1640 to me that you do. My concern is that this be done in a very 1641 smooth and fair way because if in moving through this 1642 process, I want to ask you why it is 9 years. I mean a lot 1643 of things can happen in 9 years. I mean can't you do 1644 something in a shorter period of time so that there is--so 1645 that the stakeholders have predictability and know what the 1646 rules of the game are going to be? That is one of my 1647 questions. I know that this was stuck at OMB for a long time, and I am very curious to know what all of a sudden 1648 1649 loosened this up, so that OMB changed its mind. What was it 1650 that concerned them that held it up for so long, and what is 1651 it that put them in a better mood and gave you the hand 1652 signal to move on? And what would you say to the 1653 stakeholders, because I have listened to many of them, I 1654 don't have the answer, but I have listened to many of them about the effects of the proposed changes and, you know, what 1655

1656 is burdensome, what isn't, what would you say to them about 1657 innovation not being damaged as we move forward to protect 1658 the efficacy and the safety that I spoke to both as a member 1659 representing 700,000 people and as a patient, as an 1660 individual? 1661 Dr. {Shuren.} So phase-in for 9 years, we picked that 1662 number for a couple of reasons. One, we wanted to give labs 1663 time to better understand what requirements were, we wanted 1664 to have a process to also classify--1665 Ms. {Eshoo.} But may I--1666 Dr. {Shuren.} --the tests--1667 Ms. {Eshoo.} I just want to interject something. If it 1668 is going to take 9 years to understand something, I don't think that sends the right signal, honestly, because it--then 1669 1670 it must be so enormously complex that it is going to take 1671 almost a decade for people to figure out, so it doesn't seem 1672 like it is a source of comfort to me. Now, maybe it is the 1673 flipside. Maybe that is a comfortable zone for people, that they want to take it very, very, very slowly, but if your 1674 1675 assumption is that it is going to take 9 years for people to understand something, that, to me, suggests some kind of 1676

1677 complexity that is deep and broad.

1678 Dr. {Shuren.} Yeah, and that is--if people are looking 1679 for faster, that is a conversation to have. It is a risk-1680 based phase-in, so the highest risk ones we bring in first. 1681 There are a lot of tests out there that the risk 1682 classification hasn't been determined yet, so we need time 1683 for the public process and expert panels to look at that when 1684 we get notification of tests, and then we want to fold this 1685 in with the resources we have so we are able to manage 1686 reviews in a way that doesn't overtax the system that we 1687 have. So that is how we came up with the 9 years. 1688 Ms. {Eshoo.} Um-hum. 1689 Dr. {Shuren.} As to OMB, what I can say is a higher 1690 authority weighed in and we are moving authority. It sounds 1691 like Hebrew National Hot Dogs. 1692 Ms. {Eshoo.} Higher--it does. I was going to say it 1693 sounds like an ad. Uh-huh. 1694 Dr. {Shuren.} Yes. 1695 Ms. {Eshoo.} Yeah. 1696 Dr. {Shuren.} And then in terms of, you know, with innovation, one thing I will say is innovation isn't just 1697

1698 something new--1699 Ms. {Eshoo.} Um-hum. 1700 Dr. {Shuren.} --it is also value--1701 Ms. {Eshoo.} Um-hum. 1702 Dr. {Shuren.} --to patients. If you have an innovative 1703 test, doesn't matter if it is new, it has to be safe and 1704 effective otherwise we are not doing service by patients, and 1705 then it isn't real innovation. 1706 Ms. {Eshoo.} Um-hum. 1707 Dr. {Shuren.} Newness for the sake of newness isn't 1708 good, and spending our health care dollars just because it is 1709 new but it may not work is a fool's errand. 1710 Ms. {Eshoo.} Um-hum. 1711 Dr. {Shuren.} So how do we strike that balance on 1712 innovation--1713 Ms. {Eshoo.} Um-hum. 1714 Dr. {Shuren.} -- and safety and effectiveness. That is 1715 the dialogue we are trying to have. We put something out, at 1716 least now people can react to it and have a much more 1717 structured conversation. 1718 Ms. {Eshoo.} Thank you, Dr. Shuren.

1719 Thank you, Mr. Chairman.

1720 Mr. {Pitts.} Chair thanks the gentlelady.

1721 That completes the round of questioning. We have one 1722 follow-up per side. Dr. Burgess, you are recognized 5

1723 minutes for follow-up.

1724 Dr. {Burgess.} Mr. Chairman, I just really, really like 1725 to know the higher authority at OMB, because you and I talked 1726 about this at the end of July when you called me and said, 1727 okay, I am exercising the 60-day requirement, and my question 1728 went to the economic impact and the questions such as Ms. Eshoo asked at OMB. These are valid questions and you have 1729 1730 not--to the best of my knowledge, you have not answered those. You didn't answer it in July, you haven't answered it 1731 1732 today, so what was the deal at OMB with assessing the 1733 economic impact, or, in fact, are we progressing--proceeding 1734 on this where we really have no earthly idea as to the 1735 economic impact? 1736 Dr. {Shuren.} Well, so two different things. I quess

1737 the question originally was, you know, the holdup at OMB, the 1738 holdup was not--wasn't overdoing an economic analysis on 1739 this. They had--

1740 Dr. {Burgess.} Is that not part of OMB's job to look at 1741 the economic impact of changes made by the agencies--1742 Dr. {Shuren.} They--Dr. {Burgess.} --just as a general rule? 1743 1744 Dr. {Shuren.} They do that in rulemaking for certain 1745 rule when they review those. 1746 Dr. {Burgess.} Is that why we avoided rulemaking in 1747 this instance? 1748 Dr. {Shuren.} No, because this is enforcement policy 1749 and we do that with guidance. We have done that historically with guidance. There is nothing different here, and, in 1750 fact, as I mentioned, we came out with guidance in--7 years 1751 1752 ago--1753 Dr. {Burgess.} Okay, well--1754 Dr. {Shuren.} --in 2007. 1755 Dr. {Burgess.} But back to the question of the economic 1756 impact. 1757 Dr. {Shuren.} Um-hum. Dr. {Burgess.} Do we, as we sit here today, do we have 1758 1759 any idea as to the economic impact of this guidance that you 1760 are proposing?

1761 Dr. {Shuren.} I do not have hard numbers to share with 1762 you. And in part, some of this if you want to look at it is 1763 when we have the lay of the land for those labs that would 1764 have to come in the door and be subject. Part of it too is 1765 what will the final framework be. This is starting a 1766 dialogue so we can have that discussion about what the final 1767 policy will look like. And then lastly, as I mentioned 1768 before, labs are supposed to validate their tests. They are 1769 supposed to do the studies. As people said, hey, it is 1770 expensive to do studies. They are supposed to do that. So 1771 if they have done it, the cost to them is, in certain cases 1772 they would be sending it to us so we can review that. 1773 Dr. {Burgess.} Thank you, Mr. Chairman. I will yield

1774 back.

1775 Mr. {Pitts.} Chair thanks the gentleman.

1776 Now recognize the gentleman, Mr. Pallone, 5 minutes for 1777 follow-up.

1778 Mr. {Pallone.} Thank you, Mr. Chairman.

1779 The ACLA claims that once a manufacturer gets a test 1780 approved, it never improves it because of fear of needing new 1781 approval. And they give the example of an HIV Western Blot

1782 Kit not having significant improvement since first one was 1783 approved in the '80's, and the first kit to be approved by 1784 FDA was 2 years after the first LDT test was used without FDA 1785 approval. And ACLA also gives the example of a lab making 1786 improvements to an FDA-approved test kit, and says that the 1787 approach under the guidance of requiring labs to seek FDA 1788 approval for such activities is unreasonable, and 1789 encroachment on the practice of medicine and a disincentive 1790 that will limit patient access to cutting-edge diagnostics. 1791 So I just wanted to know how would you respond to that 1792 claim?

Dr. {Shuren.} Well, so test developers do improve their 1793 1794 tests, and I turn to the people representing that community 1795 to maybe address that on the next panel, but yes, they do come back and they do improve their tests. In the setting 1796 1797 where there wasn't a test available, one of the things we have in our framework is an LDT for an unmet need where there 1798 1799 is no approved or cleared test to allow then labs in certain 1800 circumstances to have that test, have it out there and not go 1801 through FDA review, but then when a company comes in and they 1802 make the test for the same intended use, now we have an FDA-

1803 approved test, we have seen the data, we know it is safe and 1804 effective, that is the time for the other lab to say I either 1805 want to bring in my test and share the data, or I will use 1806 the FDA-approved test. And then if they want to improve a 1807 test or they want to make a better test, then have the data 1808 to support it because we have seen, you know, where you make 1809 a claim it is better but is it really a better test, because 1810 you are telling doctors it is a better test, so use my test 1811 because it is better than the one the FDA approved. Well, 1812 how do doctors know that? That is what we are here for, to 1813 try to make those assurances if you are truly making it 1814 better. And we have seen sometimes you claim a test is 1815 better, you add other markers on, but it turns out you 1816 haven't shown those markers actually better inform the 1817 diagnosis. But you should do that.

1818 Mr. {Pallone.} All right, thanks. I think, you know, 1819 we need to achieve the right balance, but I appreciate it. 1820

Thank you, Mr. Chairman.

1821 Mr. {Pitts.} Chair thanks the gentleman.

1822 That concludes the questions of the committee at this time. We will have follow-up questions for you that we will 1823

1824 send. We ask you please respond promptly. And thank you for 1825 your patience and responsiveness this morning. 1826 This concludes the first panel. We will take a 3-minute 1827 recess as the staff sets up the second--1828 [Recess] 1829 Mr. {Pitts.} The subcommittee will reconvene. We will 1830 ask everyone to please take their seats, and ask the 1831 witnesses to please take their seat at the table. Please 1832 take your seats. I would like unanimous consent to submit 1833 the following for today's hearing record. Comments of the 1834 Small Biotechnology Business Coalition, a statement from the 1835 Association for Molecular Pathology, a letter from Randy 1836 Scott, Chairman, CEO of InVitae Corporation in San Francisco, 1837 and a letter from the American Association of Bioanalysts, 1838 the AAB, and the National Independent Laboratory Association, 1839 NILA, representing independent community and regional clinical laboratories. 1840 1841 Without objection, so ordered. 1842 [The information follows:]

1844 Mr. {Pitts.} On our second panel today we welcome each of you, and I will introduce the panel in the order of their 1845 presentations. First, Mr. Andrew Fish, Executive Director, 1846 1847 AdvaMed Diagnostics; then Dr. Kathleen Behrens Wilsey, Co-Founder of Coalition for 21st Century Medicine; Mr. Alan 1848 1849 Mertz, President, American Clinical Laboratory Association; 1850 Dr. Christopher Newton-Cheh, Assistant Professor of Medicine, 1851 Harvard Medical School, and Cardiologist, Massachusetts 1852 General Hospital, testifying on behalf of the American Heart 1853 Association; and finally, Dr. Charles Sawyers, Immediate-Past 1854 President, American Association for Cancer Research. 1855 Thank you all for coming. Your written testimony will be made a part of the record. You will be each given 5 1856 1857 minutes to summarize your testimony. 1858 And, Mr. Fish, we will start with you. You are 1859 recognized for 5 minutes.

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1860	^STATEMENTS OF ANDREW FISH, EXECUTIVE DIRECTOR, ADVAMED
1861	DIAGNOSTICS; KATHLEEN WILSEY, PH.D., CO-FOUNDER, COALITION
1862	FOR 21ST CENTURY MEDICINE; ALAN MERTZ, PRESIDENT, AMERICAN
1863	CLINICAL LABORATORY ASSOCIATION; CHRISTOPHER NEWTON-CHEH,
1864	M.D., ASSISTANT PROFESSOR OF MEDICINE, HARVARD MEDICAL
1865	SCHOOL, CARDIOLOGIST, MASSACHUSETTS GENERAL HOSPITAL; AND
1866	CHARLES SAWYERS, M.D., IMMEDIATE-PAST PRESIDENT, AMERICAN
1867	ASSOCIATION FOR CANCER RESEARCH

1868 ^STATEMENT OF ANDREW FISH

Mr. {Fish.} Thank you, Chairman Pitts, Ranking member 1869 } 1870 Pallone, and Members of the subcommittee, for the invitation 1871 to testify at today's hearing. My name is Andrew Fish, and I 1872 am the Executive Director of AdvaMed Dx, the trade 1873 association representing the leading manufacturers of medical 1874 diagnostic tests. I have submitted a longer statement for 1875 the record, and will summarize key points for you this 1876 morning.

1877 AdvaMed Dx member companies develop FDA-cleared

1878 diagnostic tests for use in a wide range of health care 1879 settings, not only in clinical laboratories, but also in 1880 numerous point-of-care environments, including emergency 1881 rooms, doctors' office, clinics--doctors' offices, clinics, 1882 and even in the home.

1883 Whether developing a rapid molecular test for flu or TB, 1884 an implantable blood glucose monitor that interfaces with a 1885 smartphone, advanced genetic tests designed to guide use of 1886 specific cancer drugs, or the first FDA-approved platform for 1887 high-speed gene sequencing, diagnostic manufacturers are 1888 proud to wear the mantle of innovation in this critical area 1889 of health care.

AdvaMed and AdvaMed Dx have been pleased to work closely with the Energy and Commerce Committee on many issues related to FDA regulation of medical devices and diagnostics, and appreciates the committee's continued leadership.

1894 The questions before the committee today are whether and 1895 how laboratory-developed tests or LDTs should be regulated to 1896 assure their safety and effectiveness. Three essential 1897 points support our conclusion that FDA should regulate LDTs 1898 under a risk-based approach. First, LDTs are diagnostic

tests, and all diagnostics present the same patient risks, 1899 1900 regardless of whether they are developed by a manufacturer or 1901 a laboratory. Second, the LDT market has changed 1902 dramatically in recent years to encompass even the most 1903 advance, complex and high-risk tests, and under our current 1904 oversight paradigm, LDTs are not reviewed for safety and 1905 effectiveness, when the same test made by a manufacturer are 1906 subject to FDA clearance or approval. Third, existing 1907 statute and FDA regulation already encompass LDTs, and FDA's 1908 decision to enforce those regulations with respect to LDTs is 1909 an appropriate policy decision by the only agency with the 1910 authority, expertise and infrastructure necessary to assure 1911 the safety and effectiveness of diagnostics. 1912 We have spoken earlier in this hearing about CMS's

authorities over laboratories under CLIA. CMS itself as the agency that implements CLIA has made it clear that CLIA does not duplicate FDA regulation. FDA regulation encompasses numerous elements that were never intended to be covered by CLIA, including premarket review and assurance of clinical validity. It makes no sense to create a new set of authorities at CMS when FDA has a well-developed regulatory

1920 system and infrastructure that already encompasses LDTs. 1921 For years, stakeholders have recognized the inadequacy 1922 of current oversight of LDTs, and have called for FDA to 1923 force existing regulations that apply to LDTs, just as they 1924 do to all other diagnostics. I submitted a document noting 1925 comments from a variety of stakeholders supporting FDA action 1926 on LDTs, and ask that it be included in the record. 1927 The current diagnostics oversight paradigm results in a 1928 tremendous public health gap, and highly disparate treatment 1929 of tests that are the same from the perspective of patient 1930 risk and safety, simply on the basis of whether they are 1931 developed by a manufacturer or a laboratory. This is bad 1932 public policy, provides an opportunity to use tests in a 1933 clinical setting that have insufficient clinical data, and stifles investment in high-quality products that are assured 1934 1935 safe and effective for patients. 1936 We see these challenges arise, for example, when,

1930 we see these endiringes arrise, for example, when, 1937 shortly following an FDA approval of a pharmaceutical, along 1938 with its companion diagnostic, laboratories advertise that 1939 they can perform an LDT version of that diagnostic test. 1940 It is important to note that the threshold question of

1941 whether LDTs should be regulated by FDA turns first and 1942 foremost on patient safety. From this perspective, we 1943 believe that FDA oversight of LDTs is necessary. While FDA 1944 regulation is not without challenges for our industry, we 1945 have worked constructively with the Agency on various improvements to its regulation of diagnostics, and are 1946 1947 pleased with significant progress, including increased use 1948 exemptions and a new triage program to speed reviews. We 1949 look forward to continuing to work with this committee on 1950 ways to help improve FDA oversight.

1951 The risk-based approach to LDT regulation that FDA has 1952 set forth addresses current gaps in LDT oversight by focusing 1953 Agency resources on tests that pose the highest risk to 1954 patients. At the same time, FDA appropriately recognizes the important role that LDTs can play in providing care to 1955 1956 patients in the medical institution setting, and explicitly 1957 preserves the ability of laboratories in those settings to 1958 continue innovating in the area of LDTs. AdvaMed Dx commends 1959 FDA for moving forward to address the patient safety gaps 1960 that currently exist in LDT oversight, and supports the key 1961 elements of the oversight framework that FDA recently

1962 announced.

- 1963 Again, thank you for the opportunity to speak to this
- 1964 important issue at today's hearing.

1965 [The prepared statement of Mr. Fish follows:]

1967 Mr. {Pitts.} Chair thanks the gentleman.
1968 Now recognize Dr. Behrens Wilsey 5 minutes for an
1969 opening statement.

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1970 ^STATEMENT OF KATHLEEN BEHRENS WILSEY, M.D.

1971 } Ms. {Behrens Wilsey.} Good morning, Chairman Pitts, 1972 Ranking Member Pallone, and Members of the subcommittee. I 1973 am Dr. Kathy Behrens Wilsey, Co-Founder of the Coalition for 1974 21st Century Medicine. On behalf of the Coalition, thank you 1975 for convening today's important hearing to address this 1976 critical issue in health care innovation, and for inviting 1977 the Coalition to testify.

1978 Today, we live in a world in which a woman with breast cancer can confidently and reliably reject toxic and 1979 1980 potentially life-threatening chemotherapy because testing has 1981 confirmed she will not benefit from such treatment. Without 1982 such testing, she would only experience harmful side-effects 1983 from a treatment protocol that has been, until very recently, both standard and routine care. With diagnostic test 1984 1985 information, she has more certainty that conventional 1986 treatment would neither improve the quality of, nor prolong 1987 her life. This woman benefits from significant progress in advanced new--in new advanced diagnostics. Most importantly, 1988

1989 this progress has substantially improved patient outcomes 1990 without diminishing safety, though occurring in the midst of 1991 formidable regulatory uncertainty. 1992 I am here today because, despite some well-known 1993 examples like the women who now have far greater certainty 1994 about their treatment pathway, investment in advanced 1995 diagnostics suffers from great uncertainty; uncertainty about 1996 evidence development and reimbursement. The overall return 1997 is lower for diagnostics than for pharmaceuticals, so while 1998 the challenges may appear to be the same, this lower return 1999 has resulted in attracting fewer investors and less capital. 2000 Investment in and development of advanced diagnostics 2001 has declined in recent years as a direct result of 8 years of 2002 regulatory uncertainty. The lack of a clear path for 2003 innovative in vitro diagnostics under the current FDA regulations has been evident as FDA proposes and withdraws 2004 different proposals, each time rolling back its historic 2005 2006 flexible regulatory approach. Prolonging the current regulatory limbo, or worse, implementing an incomplete or 2007 2008 overly burdensome regulatory framework, will accelerate the 2009 shift to venture capital investment out of advanced

2010 diagnostics and into more predictable endeavors.

2011 And so we find ourselves at a crossroads. The 2012 overwhelming success of the human genome project and its 2013 medical and scientific advances are closer than ever to 2014 accelerating what this committee calls 21st Century Cures; 2015 early, rapid and comprehensive diagnosis, followed by 2016 individualized targeted treatments against serious and life-2017 threatening diseases, and yet the proposed regulation of 2018 laboratory-developed tests control progress and fight against 2019 cancer. Cardiovascular disease, deadly infectious diseases, 2020 and countless rare diseases and disorders that can be more 2021 effectively and efficiently combated through advanced 2022 diagnostics.

2023 The framework put forth by the FDA is no doubt an 2024 improvement over the initial draft guidance published in 2025 2006. Yet, in the interest of extending our impressive 2026 progress in the development of new advanced diagnostics to 2027 help patients, and at the same time avoiding additional 2028 barriers to innovation, the Coalition recommends the FDA 2029 provide detailed substantive guidance on many outstanding issues before its proposed framework is finalized; a 2030

2031 framework that starts a clock for compliance among affected 2032 laboratories. Specifically, the FDA must, among other 2033 things, identify the device within the LDT service, harmonize 2034 FDA and CLIA quality systems regulations, which have 2035 different and, in certain areas, incompatible purposes, 2036 provide clear guidance on requirements for obtaining labeling 2037 that is useful for clinicians and patients, and accommodate 2038 medical communications between laboratories and treating 2039 physicians under an FDA regulatory framework that imposes 2040 substantial limitations on proactive communications by 2041 medical product manufacturers. We also need a flexible 2042 regulatory system which enables the rapid translation of 2043 scientific and clinical evidence that so powerfully enables 2044 timely access to the newest generation of tests. 2045 Additionally, clear and meaningful labeling is critical for 2046 physicians and patients, otherwise public and private payers 2047 resist providing coverage and patients do not get tested. Ιt literally takes years for payers to approve coverage and 2048 2049 payment for advanced diagnostics, and they are not likely to 2050 pay if the FDA-approved label suggests that the test cannot be used in a clinically meaningful way. Given the FDA's 2051

2052 recent framework, we caution the subcommittee about the 2053 potential number of tests that might be subject to premarket 2054 review. 2055 Finally, we have concerns that the FDA underestimates 2056 the challenges associated with translating regulatory 2057 processes developed to oversee diagnostic products that are 2058 designed for both broad distribution and use, in contrast to 2059 services performed by individual labs. Most venture capitals 2060 appreciate that there are significant differences between the 2061 2 that could substantially risk the successful implementation 2062 of the FDA's plans.

We applaud the subcommittee for exercising its oversight 2063 2064 function by holding this hearing, and encourage Congress to 2065 continue to work with the FDA throughout the public comment 2066 process. We also encourage the subcommittee to consider 2067 legislation where necessary, to fill gaps in the regulatory 2068 framework, and address potential inconsistencies and 2069 duplication across regulatory authorities to ensure that the 2070 balance between advancing the public health and facilitated 2071 American innovation is maintained.

2072 Thank you.

2073 [The prepared statement of Ms. Behrens Wilsey follows:]

2075 Mr. {Pitts.} Chair thanks the gentlelady.
2076 Now recognize Mr. Mertz 5 minutes for opening statement.

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2077 ^STATEMENT OF ALAN MERTZ

2078 Mr. {Mertz.} Thank you, Chairman Pitts and Ranking } Member Pallone, for the opportunity to testify today. I am 2079 2080 Alan Mertz, President, American Clinical Laboratory 2081 Association, ACLA, and we represent the Nation's providers of 2082 clinical laboratory services. 2083 I also want to begin by applauding Chairman Upton and 2084 Representative DeGette for launching the 21st Century Cures 2085 Initiative. Through the innovations in clinical laboratories, we are 2086 2087 diagnosing diseases earlier and more precisely for diabetes, 2088 cancer, and infectious and rare diseases. With these 2089 powerful new diagnostic tools, patients have access to more 2090 targeted and effective therapies sooner, which inevitably increases the quality of care, saves lives and lowers cost. 2091 2092 America is the leader in this diagnostic medicine 2093 revolution, and recent advancements in genetic and genomic 2094 tests have created over 116,000 jobs, and \$16.5 billion in annual economic output. A reasonable and flexible framework 2095

2096 is essential to preserving this vital leadership role that we 2097 have in the United States.

ACLA is greatly concerned by the FDA's notice of intent to issue guidance that would completely alter how clinical laboratory tests will be made available to patients. We do not believe that the FDA has the statutory authority to regulate laboratory services, and even if they did, we do not believe that it is appropriate to create a whole new regulatory process through guidance documents.

2105 The laboratory industry is already extensively regulated 2106 under an interlocking framework of federal laws, state laws and peer review-deemed authorities. As has been discussed 2107 2108 today, the primary federal law governing labs is CLIA, which 2109 creates stringent requirements governing the operation of 2110 clinical labs and their personnel to ensure the safe and 2111 accurate function of labs and testing services they provide. 2112 Further, peer review authorities add additional expertise in 2113 reviewing both the operation of the lab, and the analytical 2114 and clinical validity of the tests. Operating under this 2115 comprehensive yet flexible LDT oversight framework, the field of laboratory medicine has produced some of the most 2116

2117 spectacular advances in diagnostics.

2118 In short, LDTs have become ubiquitous in clinical 2119 patient care. They range from the most common tests that 2120 many of us will be familiar with, like pap smears, to the 2121 most advanced molecular and genetic tests in cancer and heart 2122 disease. Importantly, the vast majority of new genetic and molecular tests are LDTs, and most FDA-approved and cleared 2123 2124 kits are based upon tests originally offered as LDTs. 2125 Although the FDA claims that it has no interest in 2126 duplicating CLIA's oversight requirements, the FDA 2127 notification that came out does not address how they avoid such duplication. There has not been any discussion of how 2128 2129 any additional regulation by the FDA would interact with the 2130 regulation already in--under CLIA. There are many areas of 2131 commonality and overlap, specifically as it pertains to 2132 validation, inspections, quality system regulation, and yet 2133 the FDA has not clarified how it propose the 2 regulatory 2134 authorities working in such a way as to not overburden the 2135 lab industry, and slow the development of and access to these 2136 vital diagnostic tools. Frankly, we are deeply concerned that the documents released failed to take into account the 2137

fundamental differences between a device manufacturer and a 2138 2139 clinical laboratory. Unlike a device manufacturer, a 2140 clinical laboratory is an integrated operation consisting of 2141 highly trained and certified personnel who design, validate, 2142 perform and interpret laboratory tests. Defining exactly 2143 what the device is that FDA seeks to regulate, or where the 2144 manufacture of the test ends and the performance of the test 2145 begins, has yet to be explained. 2146 Lastly, I need to emphasize the enormous scale of the 2147 increase in regulatory oversight. According to FDA's 2148 framework, the Agency will not define high risk or identify 2149 how many tests will require premarket approval for several 2150 years. The potential workload for the FDA is staggering. 2151 There are over 11,000 highly complex laboratories that 2152 perform laboratory-developed tests, and the total volume of 2153 LDTs numbers at least in the tens of thousands, and our own 2154 surveys of our members indicate it may be over 100,000 2155 laboratory-developed tests. In comparison, last year, the 2156 FDA approved only 23 premarket applications for diagnostic 2157 tests.

2158 In conclusion, the ACLA shares the goals of everyone

2159	here in ensuring patient access to accurate, reliable and
2160	meaningful tests. We have long supported modernizing the
2161	regulatory requirements under CLIA to keep pace with changing
2162	technology. We are confident that this can be accomplished
2163	without duplicative regulation, oversight and cost, while
2164	maintaining our status as a global leader in diagnostic
2165	innovation. We look forward to continuing to work with this
2166	committee, with Congress, the FDA, CMS, and other
2167	stakeholders on policies that encourage innovation, ensure
2168	safety, and maintain patient access to these diagnostic
2169	services.
2170	And with that, I thank you and look forward to your
2171	questions.
2172	[The prepared statement of Mr. Mertz follows:]

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2174 Mr. {Pitts.} Chair thanks the gentleman.
2175 Now recognizes Dr. Newton-Cheh 5 minutes for an opening
2176 statement.

2177 ^STATEMENT CHRISTOPHER NEWTON-CHEH, M.D.

2178 Dr. {Newton-Cheh.} Chairman Pitts, Ranking Member } 2179 Pallone, and Members of the subcommittee, thank you for 2180 giving me the opportunity to testify before you today. My 2181 name is Christopher Newton-Cheh, I am a cardiologist at 2182 Massachusetts General Hospital, specializing in heart failure 2183 and cardiac transplantation, and an assistant professor of 2184 Madison and Harvard Medical School. I am also a 2185 cardiovascular geneticist, investigating the root causes of cardiovascular disease, the leading cause of morbidity and 2186 2187 mortality worldwide. 2188 Today, I speak to you not only as a clinician and

2189 researcher, but also as a volunteer for the American Heart 2190 Association, a nonprofit organization dedicated to building 2191 healthier lives, free of cardiovascular disease and stroke. 2192 I am concerned about the lack of enforcement of regulation on 2193 laboratory-developed tests.

2194 The potential for personalized medicine to improve 2195 health and improve the practice of medicine is great.

2196 Biomedical research continues to build on the sequencing of 2197 the human genome to better understand the genetic component 2198 of disease, notably, in the discovery of new genetic markers 2199 associated with disease risk, as well as drug advocacy and 2200 toxicity.

As we continue to develop a greater understanding of the genetics of human disease, we will move away from one-sizefits-all medicine, to more targeted and effective prevention, treatments and even cures. However, it is imperative that these tests are scientifically credible.

2206 Over the past few years, a greater number of LDTs have 2207 come onto the market without FDA review, that purport to 2208 inform individuals of their risk for cardiovascular disease, 2209 and which medicines and dosages will be most effective or 2210 ineffective in treating their disease. Expert consensus 2211 quidelines summarize research evidence, but there is no 2212 regulatory mechanism enforced that attempts to compare such 2213 evidence to claims made in marketing these tests. The 2214 current CLIA-approval process ensures only the analytical 2215 validity or accurate measurement, but fails to address clinical validity; whether a test result is clinically 2216

2217 important to a patient's health decision-making.

2218 In the absence of such an independent examination, 2219 health care professionals, patients and payers have no 2220 assurance of the value and limits of each test. The genetics 2221 of some relatively rare cardiovascular conditions caused by 2222 single mutations, like long QT syndrome and hypertrophic 2223 cardiomyopathy, has been well characterized, and LDTs have 2224 been critical components of medical care, family screening, 2225 and development of therapeutics for such diseases. However, 2226 we are in the early stages of understanding how each person's 2227 risk for common disease is influenced by their DNA. An individual's risk of heart attack, heart failure or atrial 2228 2229 fibrillation is a complex interaction of their genetics, 2230 their behavior and their environment.

A 2006 investigative study by the GAO observed the genetic testing companies they investigated ``mislead consumers by making predictions they--that are medically unproven and so ambiguous that they do not provide meaningful information to consumers.'' And the FTC issued a statement warning the public to be ``wary of claims about the benefits of these products--the benefits these products supposedly

2238 offer.'' The public is not equipped to do this on its own. 2239 Despite the remarkably rapid progress that has been made 2240 in our understanding of the genetics of cardiovascular 2241 disease in recent years, it is not yet possible to assess a 2242 person's DNA to evaluate their risk for most common diseases 2243 with sufficient accuracy on which to base treatment 2244 decisions. It is clear that some genetic tests lack 2245 scientific credibility. Allowing these test to continue to 2246 be marketed without rigorous oversight increases the risk of 2247 undermining public and health care provider confidence in the 2248 utility of employing genetic tools to improve health care. 2249 There are differences between a test kit shipped out to 2250 laboratories and an LDT that is performed in a single 2251 laboratory. However, regardless of how and where the test is 2252 performed, the interests of health care providers and 2253 patients remain the same. They need to have the same degree 2254 of confidence that it is a high quality test, where the 2255 claims of its validity are substantiated by science, and its 2256 application to improve patient health established.

2257 I have had patients come to me with genetic tests that 2258 suggest slightly increased risks of atrial fibrillation or

2259 heart attack, but they are confused because their regular 2260 physicians do not know how to interpret results. They ask me 2261 whether they should take aspirin, cholesterol-lowering 2262 statins or blood thinners. These are medications with risks 2263 and benefits that must be carefully matched to individual patient risks. Statins have been well established to lower 2264 2265 risk of heart attack, and people with coronary disease are at 2266 high risk of it. A currently marketed genetic test purports 2267 to determine whether they are likely not to respond to a 2268 statin, or to have higher risk of heart attack. The small 2269 studies that initially supported this claim have been completely debunked by much larger studies, but the marketing 2270 2271 continues. Not taking a statin because a patient or their 2272 doctor believes falsely that they will not respond could contribute to a potentially fatal outcome. This cannot 2273 2274 continue. The HA applauds the FDA for its decision to reconsider its enforcement discretion with regard to the 2275 regulation of LDTs. This is the right thing to do for 2276 2277 patients.

2278 Thank you very much. I will be happy to answer any 2279 questions you may have.

2280 [The prepared statement of Dr. Newton-Cheh follows:]

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2282 Mr. {Pitts.} Chair thanks the gentleman.
2283 Now recognizes Dr. Sawyers 5 minutes for opening
2284 statement.

2285 ^STATEMENT OF CHARLES SAWYERS, M.D.

2286 Dr. {Sawyers.} Good morning, Mr. Chairman, and } 2287 distinguished Members of the subcommittee. My name is Dr. 2288 Charles Sawyers. I am an oncologist and a cancer researcher, 2289 and the chair of a cancer research department at Memorial 2290 Sloan Kettering Cancer Center in New York. I am also the 2291 immediate Past-President of the American Association for 2292 Cancer Research, or ACR, which is the world's oldest and 2293 largest cancer research organization, with over 35,000 members, representing basic translational, clinical 2294 2295 researchers, health care professionals, patients, and 2296 advocates in the U.S. and abroad, and I am honored to appear 2297 before you today.

I want to begin by reminding us what a remarkable time it is in cancer research and with the development of many new cancer drugs. This is all, you know, dovetails from our investment as a country in 1971 to defeat cancer through the National Cancer Act. Now, more than 4 decades later, this commitment is finally paying off. By my last count, over 45

2304 new lifesaving cancer drugs were approved just in the last 10 2305 years, including one just last Friday. 2306 So I want to point out three things that came together 2307 to make this slope of increase in cancer drug development 2308 happen so quickly over the last 10 years. First, we finally 2309 understand the cause of cancer. Cancer is a disease of 2310 mutant genes, and by knowing the names of those genes and how 2311 they cause cancer, we can discover new drugs that kill cancer 2312 cells by attacking them at their roots. The second is the 2313 human genome project. By knowing the names of all the genes 2314 in our DNA, we have been able to catalog over the last 2315 several years all the ones that are mutated in cancer. This 2316 knowledge teaches us that cancer is not just 10 or 20 2317 different diseases called lung, colon, breast and prostate 2318 cancer, but hundreds of diseases defined by the mutant genes 2319 that cause them. This also empowers us to develop the drugs 2320 to treat each cancer more effectively. And the third is 2321 technology. Just 5 years ago, DNA sequencing was so 2322 specialized that it could only be carried out in research 2323 settings, using highly curated tumor specimens, but today, this technology is routinely deployed in many of the major 2324

2325 cancer centers throughout our country, and tomorrow, this
2326 technology will become a routine part of workup of all cancer
2327 patients.

2328 I know this from firsthand experience. Fifteen years ago, I co-lead the first clinical trial of a drug called 2329 2330 Gleevec that is a highly effective drug for a form of blood 2331 cancer known as chronic myeloid leukemia, or CML. All 2332 patients with CML have a very specific gene mutation, and 2333 prior to Gleevec, had a life expectancy of just a few years, 2334 but now CML patients live for decades simply by taking this pill once a day that targets the cancer cells without the 2335 2336 side-effects of chemotherapy or radiation. In fact, many of 2337 the patients I treated on the first clinical trial back in 2338 1999 are alive and well today. And similar stories can be 2339 told for melanoma, lung cancer, colon cancer, and sarcoma and so on, and medical historians will look back and call this 2340 2341 the golden age of cancer therapy.

2342 So what--why am I here today to talk about LDTs? Well, 2343 it is obvious, because diagnostics are critical to the 2344 success of this targeted cancer therapy. Indeed, as we have 2345 heard from many of the speakers today, the mantra of

2346 personalized medicine is the right drug for the right 2347 patient. And the FDA recognizes this and approves these new 2348 targeted cancer therapies in conjunction with the so-called 2349 companion diagnostic which we have heard about, which 2350 undergoes a rigorous validation process, just like the drug. 2351 Therefore, a safe, reliable and effective diagnostic test is 2352 as important as a safe, reliable and effective drug. 2353 Now, the problem is urgent because gene sequencing will 2354 soon become a routine part of cancer care. Hundreds of 2355 thousands, if not millions, of patients are going to be impacted by this technology over--in the coming years, and I 2356 2357 think we all agree that physicians and patients must be able 2358 to trust the claims made by the developers of these tests, 2359 especially when they are used to determine the treatment 2360 regimen for a cancer patient. Too much is at stake to 2361 compromise on the regulatory standards that govern them. 2362 And gene sequencing technology is evolving very rapidly, 2363 one of the most innovative industries I have seen, and we ae just at the tip of the iceberg of what may be possible. I 2364 2365 think we will soon be able to detect cancer mutations in a single drop of blood. Many innovative companies are entering 2366

2367 the field and are looking for clarity from the FDA on how to 2368 commercialize these and related technologies. Just as with 2369 drug approvals, a clearly-defined regulatory process will 2370 lead to greater innovation and investment. 2371 For all these reasons, ACR, which I represent, as well 2372 as my own experience in the cancer research field, I applaud 2373 the FDA for proposing a classification of LDTs based on the 2374 risks posed by the test to the patient. Having a single 2375 strict regulatory approval standard will assure--reassure the 2376 American public that the tests used in a high-risk health care setting are safe, accurate and effective, and will 2377 2378 encourage the private sector to invest in this promising area 2379 of medicine. 2380 I want to close by submitting for the record the ACR's

2380 I want to close by submitting for the record the ACR's 2381 policy statement on the regulation of diagnostics entitled, 2382 reliable and effective diagnostics are keys to accelerating 2383 personalized cancer medicine and transforming cancer care.

2384 Thank you.

2385 [The prepared statement of Dr. Sawyers follows:]

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2387	Mr. {Pitts.} Chair thanks the gentleman.
2388	Thanks to all the witnesses for your opening statements.
2389	I have a unanimous consent request. Submit for the
2390	record a letter dated September 8 from the Combination
2391	Products Coalition. Without objection, that will be entered
2392	into the record.
2393	[The information follows:]

2395 Mr. {Pitts.} I will begin the guestioning, and 2396 recognize myself 5 minutes for that purpose. 2397 Mr. Fish, we will start with you. I have heard 2398 companies and past witnesses remark that regulatory 2399 uncertainty and a lack of incentives in the diagnostics space 2400 have contributed to innovative products sitting on companies' 2401 shelves. Do you believe this guidance document would address 2402 these issues or create more regulatory uncertainty? 2403 Mr. {Fish.} Mr. Chairman, we believe that this proposed 2404 framework by the FDA would help reduce the current uncertainty in diagnostics by ensuring similar review for 2405 2406 tests that present a similar level of risk, and make it 2407 clearer for both laboratories and manufacturers alike what 2408 the path forward is to provide the clinical diagnostics to patients. So in our view, we believe this would help address 2409 2410 the stifling of innovation we see under the current system. 2411 Mr. {Pitts.} Mr. Mertz, you state in your testimony that enhancing CLIA may be the way to go. CMS, the agency 2412 2413 that implements CLIA, recently stated, ``CLIA does not address the clinical validity of any test, that is the 2414

2415 accuracy with which the test identifies measures or predicts 2416 the presence or absence of a clinical condition or predisposition in a patient. On the other hand, FDA does.'' 2417 2418 CMS has clearly indicated that it does not want, nor could it 2419 handle, additional testing responsibilities authority in this 2420 area. Why are you still proposing it? 2421 Mr. {Mertz.} Thank you. And we have known over the 2422 years that CLIA has taken the position that they do not 2423 regulate clinical validity. We actually believe under their 2424 statutory authority that they could, and the regulations on CLIA actually touch on that. They are required the clinical 2425 accuracy of the test, the performance of the tests are 2426 2427 regulated. However, because there is this perceived gap that they do not regulate clinical validity, we have been very 2428 2429 supportive for many years for modernizing CLIA, for strengthening CLIA so that it would specifically require CLIA 2430 2431 to look at the clinical validity of all new laboratorydeveloped tests. We were supportive of Congressman Burgess' 2432 bill, the Modernizing CLIA Act, which would have specifically 2433 2434 have an approval process for all new laboratory-developed

2435 tests, not just a few that the FDA will be able to look at,

2436 but they would review the clinical validity of all new 2437 laboratory-developed tests. 2438 In addition, I would touch on the resource issue that 2439 has been talked about today. The FDA is supported by--20 to 2440 30 percent of their funding is from the user fee. They only 2441 approved 23 tests. CLIA actually is funded 100 percent by a 2442 lab user fee, and a recent--a GAO report from a couple of 2443 years back indicated that they had \$70 million in carryover 2444 money they hadn't spent. They have a lot of resources there 2445 that they could use. The other thing is they--CLIA would not 2446 have to--FDA is proposing to duplicate all of the things 2447 underlying looking at clinical validity. They will have new 2448 inspections, new registration, licensing, labeling, all these 2449 things will be done a second time. You could very 2450 surgically, with CLIA, go in, add that clinical validity 2451 requirement, have adverse reporting, and it would be fully 2452 funded by the laboratory industry with the funds that we 2453 provide in the user fee. So we think that would actually be 2454 a much more effective way to guarantee the safety of these 2455 tests, and establish the clinical validity of them. 2456 Mr. {Pitts.} Thank you.

2457 I have a couple of questions for all of you--for each of 2458 you. So regardless of whether you agree or disagree with the 2459 substance of the guidance, do you believe it would be a 2460 significant shift in longstanding Agency policy and a departure from existing practice for the regulated industry? 2461 2462 Mr. Fish, we will start with you. Just go down the 2463 line. 2464 Mr. {Fish.} So we concur with FDA's assessment that 2465 this framework would represent a change in practice by the 2466 Agency, but not a change in regulation. Since the FDA is essentially not proposing to change any current regulation 2467 that applies to diagnostics, but simply to extend its 2468 2469 enforcement of those regulations to laboratory test 2470 developers. That is our--we--so we share that opinion with 2471 FDA.

2472 Mr. {Pitts.} Okay, and you can answer yes or no if you 2473 would like. Do you believe, Dr. Behrens Wilsey, that it 2474 would be a significant shift in longstanding Agency policy, 2475 and a departure from existing practice for the regulated 2476 industry?

2477 Ms. {Behrens Wilsey.} The Coalition does think it would

2478 be a significant shift and change in long-term policy, but 2479 that is the reason why we believe many of these questions 2480 need to be answered in advance to finalizing guidance. 2481 Mr. {Pitts.} Mr. Mertz? 2482 Ms. {Behrens Wilsey.} And we think if that were the 2483 case, that it would go to resolving a lot of the issues. 2484 Mr. {Pitts.} Mr. Mertz? 2485 Mr. {Mertz.} We do think it would be a completely 2486 substantial shift in what they have regulated. From the time 2487 that the device amendments were enacted in 1976 until the early '90's, they never said anything about regulating 2488 laboratory-developed tests, even while CLIA was being enacted 2489 2490 in '88. There was no mention in Congress, in FDA. They 2491 asserted absolutely no authority over laboratory-developed 2492 tests for 16 years after the Device Act, and there were many, many hundreds of LDTs being created at that time. So we 2493 2494 think this is a significant shift in their policy. 2495 Mr. {Pitts.} Dr. Newton-Cheh? 2496 Dr. {Newton-Cheh.} Yes. This would be an important and 2497 significant shift in the practice of the FDA, exercising enforcement discretion, and it is welcome. 2498

2499 Mr. {Pitts.} Dr. Sawyers?

Dr. {Sawyers.} I would take a slightly different take. I don't think it is a shift in the sense that companion diagnostics have been a standard part of the approval of targeted cancer drugs now for about 8 to 10 years. I think the shift, of course, is expanding that to LDTs that are not--are measuring the same thing, but not subject to the same regulation.

2507 Mr. {Pitts.} All right, and then the second question, 2508 we can go in the reverse order. Dr. Sawyers, do you believe 2509 FDA should establish a new framework of this nature by

2510 guidance or regulation?

2511 Dr. {Sawyers.} I think guidance would be the start to 2512 get it right, as Dr. Shuren pointed out, through dialogue,

2513 and then I think it should move to regulation.

2514 Mr. {Pitts.} Dr. Newton-Cheh?

2515 Dr. {Newton-Cheh.} I think it--the FDA's use of

2516 guidance is consistent with its past practices and its open

2517 to public comment seems acceptable.

2518 Mr. {Pitts.} Mr. Mertz?

2519 Mr. {Mertz.} Well, we question and challenge their

2520 statutory authority to even do guidance or regulation in this 2521 area. However, if they were to proceed, it definitely should 2522 be done through notice and comment rulemaking. Mr. {Pitts.} Dr. Behrens Wilsey? 2523 2524 Ms. {Behrens Wilsey.} I am not an attorney and so I am 2525 not going to comment on FDA's authority, but I will say that 2526 the Coalition believes that guidance could be an effective 2527 tool if used properly and exercised properly. 2528 Mr. {Pitts.} Mr. Fish? 2529 Mr. {Fish.} As FDA has noted, it is not proposing to change existing regulation, but simply to enforce it with 2530 2531 respect to LDTs, and we concur with that assessment. 2532 Mr. {Pitts.} Thank you. 2533 Chair recognizes Mr. Green 5 minutes for questions. 2534 Mr. {Green.} Thank you, Mr. Chairman, and thank our 2535 witnesses for being here. 2536 We have heard a great deal about the boom of innovation 2537 in LDTs since Congress enacted the Medical Device Amendments 2538 in 1976. Over the last 4 decades, like many areas in medical 2539 innovation, the products used in patient care have significantly grown and evolved. When there are 2540

2541 revolutionary advancements in health products, a new 2542 oversight framework tailored to the specific type of device 2543 or product may be warranted. Patient safety cuts both ways, 2544 ensuring a product is safe and effective, and also ensuring 2545 fostering innovation so clinical care improves over time. 2546 Since 1976, LDTs have evolved from being limited in number 2547 and relatively simple tasks primarily used to diagnose rare 2548 diseases and conditions. Today, they have increased in 2549 number, complexity and accessibility.

2550 I understand that nearly all FDA-approved and FDAcleared test kits began as LDTs. Some of the innovation we 2551 2552 have seen in LDTs base from labs developing new tests or 2553 modifying existing tests to meet patient needs. Yet, as the 2554 complexity and accessibility of highly sophisticated tests 2555 have grown, there is a need to promote continued innovation, 2556 while recognizing the risk of LTD--LDTs posed to patients is 2557 much greater than in the past.

2558 Mr. Fish, we have heard concerns that FDA oversight will 2559 stifle innovation for tests that are for rare diseases, and 2560 will slow patient access to new tests. Can you provide a 2561 response to these concerns, and how the FDA proposes to

address this?

2563 Mr. {Fish.} Well, I think we recognize that any regulation comes with a burden, and we think the appropriate 2564 2565 question is not whether or not there is a burden associated 2566 with regulation, but whether there is a rationale for that regulation and whether the burden is commensurate with a 2567 public health issue. And our feeling is that FDA has--is 2568 2569 seeking to achieve, and largely is achieving through this 2570 framework, a balance between additional enforcement of 2571 regulation with respect to LDTs, and continued enforcement 2572 discretion. FDA has pointed out, I think pretty clearly in 2573 its framework, that with respect to a number of different 2574 categories of LDTs and settings in which LDTs are both 2575 developed and used, that it will continue to exercise 2576 enforcement discretion, thereby allowing LDT innovation to 2577 continue to flourish and serve patients in those settings. Mr. {Green.} Okay. Mr. Mertz, I understand that once a 2578 2579 test kit is FDA approved and enters the market, the 2580 laboratories may modify the kits, which is in many cases 2581 expanded uses that even improve tests.

2582 Can you speak to this, and how does the FDA proposal

## 2583 impact this practice?

Mr. {Mertz.} Yes, thank you. And we--this is one of 2584 2585 the areas we are very concerned about because, as has been 2586 pointed out, most of the LDTs, 1,000 or so new LDTs a year, 2587 most of them are created because there is no FDA-approved 2588 kit, and the patient needs the test and there is no kit. For 2589 many others, most of the rest, it is a--if there is a kit 2590 that was originally LDT, now it is an approved kit by the 2591 FDA, but it actually needs modifications in order to have it 2592 keep up with technology. And interestingly, the one example 2593 that Dr. Shuren said earlier was sort of a copy of a kit that 2594 was being used. He was actually referring to the BRAF test 2595 for melanoma patients, and he said the labs claim it was 2596 better. Well, in fact, if you look at the testimony by the 2597 AMA, in fact, the FDA-approved kit turns out that, because it 2598 was frozen in time, you have an approval process and that 2599 technology is frozen in time, that test cannot distinguish 2600 between 2 different mutations for melanoma, and the AMA 2601 pointed out the clinicians, they actually must know that the 2602 specific mutation, and really to detect the right mutation and to have the right treatment, they have to use the LDT 2603

2604 modification of the BRAF test.

2605 We see many, many other cases of this where the--the original HIV test back in 1987, which was approved, is--still 2606 2607 has not been updated. It is the LDT that has served for 25, 2608 30 years now because that technology was frozen in time. So 2609 really the FDA-approved kit actually never was the standard 2610 of care. And this is actually what most LDTs are either 2611 unmet need or they have actually made some change that is 2612 absolutely essential to clinicians in treating a patient. 2613 Mr. {Green.} Do you believe that there should be 2614 premarket review of LDTs to ensure their safety and 2615 effectiveness? 2616 Mr. {Mertz.} Well, first of all, actually what the FDA is proposing is--in the case of high-risk LDTs is not 2617 2618 premarket approval. Mr. {Green.} I know, but would you go as far as--2619 Mr. {Mertz.} Okay, but in terms of our position--thank 2620 2621 you. First of all, as I said before, we believe that the 2622 clinical validity of the test should be established. That is 2623 generally done within the lab, through the reviews of the crediting organizations, but to make it absolutely clear that 2624

2625 it is, we supported legislation that would add that 2626 requirement under CLIA to require all new laboratory-2627 developed tests, all 800 or 1,000 a year there are, to go 2628 through an approval process at CLIA to establish the clinical validity. So, yes, we do, but we think that would be a much 2629 2630 better way than doing it than duplicating CLIA again under 2631 FDA, and putting a much more burdensome process that will 2632 make it really, really untenable for much--for most tests to 2633 go through that process.

2634 Mr. {Green.} Thank you.

2635 Mr. Chairman, I have one more question, if I could ask?
2636 Mr. {Pitts.} Go ahead. Proceed.

Mr. {Green.} Mr. Fish, some of the--including some of 2637 your fellow panelists have raised questions about whether the 2638 2639 FDA has the authority to regulate LDTs, suggesting that LDTs 2640 are more akin to services provided by physicians than 2641 devices. I would like to ask your views. We heard today, 2642 Congress amended the Food--federal Food and Drug and Cosmetic 2643 Act in 1976 to give the FDA authority over in vitro 2644 diagnostics, IVTs. Can you describe what the differences there is, if any, between FDA-regulated IVTs and so-called 2645

2646 laboratory-developed tests, and how do you respond to the 2647 claim that LDTs are not subject to FDA jurisdiction? 2648 Mr. {Fish.} Well, first of all, as you note, statute 2649 clearly refers to medical devices as including in vitro diagnostic products, which are the equipment and materials 2650 used to produce in a test. Our view is that LDTs are the 2651 2652 same as diagnostics produced by a manufacturer. The question 2653 of whether or not LDTs are solely services I think obscures 2654 the fact that in--when a laboratory performs a test, there is 2655 still a test at the heart of what it performs, analogous to a doctor's office or a medical center providing chemotherapy. 2656 2657 There is a service provided in the application of 2658 chemotherapy for a patient, but there is still a drug at the 2659 center of what is being performed as a service. So I--our 2660 view is that LDTs, from a practical standpoint, still constitute a regulated article under the Medical Device 2661 Amendments, and FDA has made that case and we concur with it. 2662 2663 Mr. {Green.} Thank you, Mr. Chairman, for your 2664 courtesy. Mr. {Pitts.} Chair thanks the gentleman. 2665

2666 Now recognize the Vice Chairman, Dr. Burgess, 5 minutes

2667 for questions.

2668 Dr. {Burgess.} Thank you, Mr. Chairman, and I do thank 2669 all of our witnesses for being here today. It is an 2670 important topic that we do need to discuss.

2671 Dr. Behrens Wilsey, let me just ask you a question 2672 about, well, something that could affect, say, the off-label 2673 use of a diagnostic. If you have a manufacturer-distributed 2674 test, the laboratory can use the test off-label in the 2675 practice of laboratory medicine, and that is not going to 2676 upset the FDA. But with a laboratory-developed test, if the FDA considers the laboratory to be a manufacturer, and 2677 2678 considers the LDT service to be a device subject to the FDA's 2679 labeling rules, this could raise concerns that the laboratory 2680 is promoting off-label use.

From your perspective as an investor in laboratories performing laboratory-developed tests, how would this risk impact your decision to invest in a particular company? Ms. {Behrens Wilsey.} Thank you. I appreciate this question.

2686 This is a concern that the Coalition raised several 2687 years ago, and has discussed with the Food and Drug

2688 Administration, and the question that came up a little bit 2689 earlier today, and I greatly appreciate -- we greatly 2690 appreciate Dr. Shuren's assurance that this issue would be 2691 resolved reasonably. However, what I would say, the longstanding practice of labs consulting with physicians 2692 2693 about patient management based on the results of the test is 2694 actually a requirement under CLIA. And at the same time, if 2695 labs become manufacturers under FDA regulations, depending 2696 upon the label and the physician use of the information, the 2697 lab consultation could be considered off-label promotion. And what we believe needs to occur is, we will have to--we 2698 2699 need to wrestle down specifically what precisely would 2700 constitute a consultation, and what would precisely 2701 constitute off-label promotion, or else there is no question 2702 that, as an investor, that would chill investment in this 2703 area. That would be of great concern to investors. 2704 Dr. {Burgess.} Let me ask you a question. Mr. Mertz, I 2705 think, referenced the disparity between the number of tests 2706 and the number of approvals. From the investment 2707 perspective, I am not a lawyer, I am not an investor, I am a physician, I simply live at the--at downstream from all of 2708

2709 this, but from the investor perspective, what does that do 2710 when you are looking at whether or not to put money into one 2711 of these products, the vast number that are available, the 2712 few that have been approved through the FDA, if there is a furtherance of the FDA's reach into this area, what is that 2713 2714 likely to do? 2715 Mr. {Mertz.} So--2716 Dr. {Burgess.} Dr. Behrens Wilsey. 2717 Ms. {Behrens Wilsey.} I apologize. 2718 Dr. {Burgess.} Yeah. 2719 Ms. {Behrens Wilsey.} I--2720 Dr. {Burgess.} From the investor's perspective, this 2721 discrepancy between number of tests coming around and the 2722 number of approvals, if the FDA's grasps is indeed increased, 2723 what does that do to the viability of the--from the investor 2724 community? 2725 Ms. {Behrens Wilsey.} We are very concerned about the 2726 number of tests. I was running out of time in my oral 2727 comments so that I didn't cite the same numbers that were 2728 provided by ACLA.

2729 Have said that, we are very concerned. What would

2730 concern me as an investor is that you would create a very 2731 long line and a very protracted period of time in which these 2732 tests would have to go through the regulatory process. That 2733 absolutely would diminish interest in investing in this area. 2734 Dr. {Burgess.} And some of the financial return from a 2735 laboratory-developed test is de minimis when you compare it 2736 to a blockbuster pharmaceutical, is that not correct? 2737 Ms. {Behrens Wilsey.} Absolutely. I made the point 2738 earlier that the two most important issues affecting 2739 investors in financing companies that develop these types of 2740 tests are regulation and reimbursement. And the quantity of 2741 evidence and the time in which develop--you are required to 2742 develop that evidence so that you can provide it for the 2743 purposes of an FDA approval substantially lengthen the period 2744 in which you might generate some sort of a return. Actually, 2745 it substantially generates the period in which you have any 2746 hope of even getting reimbursed. So that is a great concern, 2747 and one of the reasons why this area does not have the same 2748 number of investors as the pharmaceutical area.

2749 Dr. {Burgess.} Mr. Mertz, I appreciate your comments 2750 about the legislation introduced in the last Congress. I

2751 haven't planned to reintroduce it yet, just with that caveat, 2752 but even--when President Obama was Senator Obama and he 2753 introduced the bill that I put into the record this morning, 2754 it was--the concept was the harmonization between CLIA and 2755 the FDA. Do you think that the bloom is off that rose, has 2756 that hour now passed and we are into a different realm where 2757 that is no longer possible?

2758 Mr. {Mertz.} No, and just interestingly, I was at ACLA 2759 when Senator Obama introduced that, and it was in reaction, 2760 in part, to what the FDA was proposing on an earlier iteration of this guidance, the IVDMIA. They were going to 2761 2762 regulate some of the LDTs, and it was in reaction to that and 2763 a much more measured approach which would rely on CLIA. But 2764 I don't think it is too late to do this with CLIA. As we 2765 heard earlier, it is going to take the FDA 9 years to 2766 recreate all of this regulation within their realm. So, no, 2767 I think--and they could ramp up much more quickly at CLIA 2768 because they have the foundation.

2769 If I could, Congressman, quickly on the investment 2770 issue. Of the many hundreds of new LDTs a year, some of them 2771 are created by small startups, they are investor-funded, but

2772 hundreds and hundreds of them are created by academic medical 2773 laboratories. There is a letter that the--that you have and 2774 the committee has from 23 of the most esteemed medical 2775 institutions in the country, the Harvards and all--Stanford and all of them, and they are very concerned. They said FDA 2776 2777 regulation of LDTs would stifle innovation and be contrary to 2778 public health. So they are not really funded by investment 2779 capital. The Mayo Clinic, which is one of our members, they 2780 create over 100 new laboratory-developed tests a year, and 2781 they are worried that they are not going to be able to 2782 innovate. It is not even an investment capital issue. 2783 Dr. {Burgess.} Okay, thank you, Mr. Chairman. I yield 2784 back.

2785 Mr. {Pitts.} Chair thanks the gentleman, and now 2786 recognize the ranking member of the full committee, Mr. 2787 Waxman, 5 minutes for questions.

2788 Mr. {Waxman.} Thank you, Mr. Chairman.

I don't hear anybody on the panel argue that there shouldn't be a very careful scrutiny of these tests. It seems like the question is who should do it; CLIA or the FDA, and I don't think CLIA has the kind of expertise that we see

2793 at FDA.

2794 Dr. Sawyers, you note in your testimony that we have 2795 been able to shift from classifying cancers by their site of 2796 origin in the body, to classifying them by their molecular 2797 subtype. I think this exemplifies the kinds of advances we 2798 need to capitalize on to further develop into targeted 2799 therapies for personalized medicine, and to speed new 2800 treatments to patients. However, we also see what was 2801 described in a 2011 New York Times article as a mini gold 2802 rush of companies trying to market tests based on the new 2803 techniques, at a time when the good science has not caught up 2804 with the financial push. 2805 Mr. Chairman, Mr. Chairman, I would like to insert into

2806 the record that article from the New York Times dated July 7, 2807 2011.

2808 Mr. {Pitts.} Without objection, so ordered.

2809 [The information follows:]

2811 Mr. {Waxman.} Thank you.

2812 Dr. Sawyers, as you note in your testimony, the success 2813 of a targeted therapy is inextricably linked to the 2814 successful development of its companion diagnostic test. You 2815 also note that implementation of FDA's risk-based framework 2816 would balance the need for encouraging innovative medical 2817 product development with the need for ensuring patient 2818 safety.

2819 Could you describe some of the harms you see from exempting lab-developed versions of these tests from FDA 2820 2821 oversight, and some of the benefits you see from having them 2822 subject to FDA oversight? And as part of your answer, could 2823 you address whether you think FDA oversight will 2824 unnecessarily limit patient access to the best new tests? 2825 Dr. {Sawyers.} Okay, well, I think that the benefit of 2826 having more oversight would be more confidence in what I will 2827 just call the me too tests that develop shortly after the approval of a companion diagnostic. The details of what the 2828 2829 regulatory requirement for approval of those, you know, second generation tests is an important detail. I can't be 2830

2831 so--such a high bar that it impairs or harms, you know,

2832 second, you know, followers from joining in, but I see that,

2833 you know, this next generation cancer drugs develop in a 2834 similar way because there is a clear set of guidelines and 2835 developers know what they need to do.

2836 I also want to make a point about the ability to compare 2837 test results across different centers and across even the 2838 world. The, you know, as -- a point I made was that cancer is 2839 now subdividing into hundreds of diseases, and so one medical 2840 center running an LDT in that clinical lab can't easily 2841 compare--the results from that can't be easily compared with 2842 other labs. So a more uniform sort of trust in the 2843 sensitivity and specificity of tests would accelerate the 2844 post-approval understanding of who--what patients are most 2845 likely to benefit from what drugs.

In terms of harm, you know, the examples have been given earlier of tests that didn't, you know, hold up to the light of day later on in subsequent publications, as made by, you know, my colleague in cardiology in his oral statement.

2850 Mr. {Waxman.} Well, Dr. Newton-Cheh, do you want to 2851 comment on the question I asked or what Dr. Sawyers had to

2852 say?

2853 Dr. {Newton-Cheh.} Yeah, I think--I mean by way of 2854 example, the American public has by and large supported FDA's 2855 regulation of pharmaceuticals. They would not support rolling back to 19th Century Wild West where snake oil is 2856 indistinguishable from safe and effective therapies, and I 2857 2858 think by the same token, they would not accept continuing 2859 unregulated LDTs in the 21st Century. I think to draw the--2860 Mr. {Waxman.} Why should FDA regulate it as opposed to 2861 CMS?

Dr. {Newton-Cheh.} I think that is what FDA does. I 2862 2863 mean FDA has structures in place with expert advisory 2864 committees, and consultation with stakeholders evaluating 2865 clinical claims, evaluating the literature. That is the 2866 business that they have been in, so I see testing as another component of clinical validity. I think CLIA historically 2867 2868 has been focused on the laboratory structures, the 2869 certifications, the personnel, and the precision of the 2870 measurement of some biologic entity, but not necessarily the 2871 interpretation or application to medical therapy.

2872 But if I could also draw a distinction between oncology

2873 where tissue is obtained, a molecular specificity is 2874 observed, and a therapy is targeted to that molecule. Well, 2875 that is a greater degree of precision than exists for 2876 cardiovascular disease. The 2 big killers are cancer and cardiovascular disease. Cardiovascular disease does not have 2877 2878 such a precisely defined molecular understanding, and so 2879 there is, I think, a potentially greater harm for misapplying 2880 the inferences that are gained in oncology, where it has 2881 really been revolutionary, and I would say in cardiovascular 2882 disease it is about 10 years behind, and much of the claims that are currently out there for genetic testing to predict 2883 2884 response to therapies are just unsupported. 2885 Mr. {Waxman.} Thank you, Mr. Chairman. 2886 Mr. {Pitts.} Chair thanks the gentleman. 2887 Now recognize the gentleman from Florida, Mr. Bilirakis, 5 minutes for questions. 2888 Mr. {Bilirakis.} Yeah, I guess it is working, okay. 2889 2890 Mr. Mertz, some here are saying that the FDA's 2891 intervention over laboratories is necessary to ``level the 2892 playing field.'' However, your testimony lays out that laboratories are already regulated by CMS, and have been for 2893

2894 decades, and that the FDA's actions may duplicate regulations 2895 rather than streamline then. Can you talk about the 2896 overlapping regulations and the problems that they could 2897 create? Mr. {Mertz.} Yes. Thank you, and I appreciate the 2898 2899 question. 2900 And some of the--some of those who make that argument 2901 that it is unregulated, it is actually a bit of a myth 2902 because it is--maybe I can just describe it best in an 2903 example. One of my academic institutions, it is a big 2904 hospital and a lab, and they told me that the lab is actually--they consider it probably the most regulated part 2905 2906 of the entire hospital, and others in the hospital look at 2907 the lab as being guite highly regulated. 2908 The other thing I want--point I want to make is that

the other thing I want point I want to make is that the --a manufacturer and a laboratory service are very different, and I think a good example of that that people understand is that a laboratory-developed test is not a product, it is not an article, it is not a machine. A pap smear--most pap smears historically are laboratory-developed tests, and this is where a specimen is taken from the

2915 patient, a slide is prepared, a cytologist looks at the slide 2916 to detect cancer. If it is positive, it will be reviewed by a pathologist. Then they make a determination, give it to 2917 2918 the OB/GYN, and that is a laboratory-developed test, and it 2919 could be considered--there is some risk involved if that 2920 diagnosis is wrong. I don't think many people would consider 2921 that procedure and that knowledge, and all of the physician 2922 involvement I just described, as a physical product that is 2923 sold commercially by a manufacturer. So that is not a 2924 manufactured product, it is a process. So that is regulated 2925 as that. So we are regulated, they are regulated. We are fundamentally different. We are--if you look at the 2926 regulations under CLIA, labs, they do, they regulate them as 2927 2928 labs. The personnel, the procedures, the specimen 2929 collection, the validity--accuracy of the test, which is very 2930 important. You look at manufacturers, it is more about 2931 quality systems and the manufacturing process. It is a very different process. But adding a whole second layer of--or a 2932 2933 third regulation to laboratories is not leveling the playing 2934 field, it is making--we are on 2 different playing fields. It would make it very difficult to innovate, very expensive 2935

2936 to innovate, and I would point out to others here that have 2937 brought up cases that--the KRAS test for colorectal cancer, 2938 there was--there has been--there was no test for 10 years for 2939 colorectal cancer until KRAS came along. The BRC for 2940 leukemia, that was a laboratory-developed test originally. A 2941 lot of them were laboratory-developed tests. So we are sort 2942 of playing on an entirely different field. We are regulated, 2943 and by adding another layer of regulation on top of labs is 2944 only going to stifle innovation.

2945 And finally, there are ways if clinical validity, we 2946 agree it needs to be addressed, that could be--you could add 2947 that to CLIA without duplicating the rest of the playing 2948 field.

2949 Mr. {Bilirakis.} Very good.

2950 Thank you, Mr. Chairman, I appreciate it. I yield back.2951 Thank you, sir, for your testimony.

2952 Mr. {Pitts.} Chair thanks the gentleman.

2953 Now recognize the vice chair of the full committee, Mrs.2954 Blackburn, 5 minutes for questions.

2955 Mrs. {Blackburn.} Thank you, Mr. Chairman, and I thank 2956 each of you for being here, and I thank you for your

2957 patience. We appreciate that you are willing to come in and 2958 talk with us. 2959 We are focused on 21st Century Cures on medical 2960 innovation, and as I said earlier with Dr. Shuren, how do we 2961 preserve access to affordable health care for all Americans, 2962 because right now, the price is going up, the networks are 2963 narrowing, and it is becoming more difficult for so many 2964 individuals in so many parts of the country to get that 2965 access they want. 2966 Mr. Fish, I want to come to you and stay pretty much with where Mr. Bilirakis is. Looking at how the diagnostics 2967 2968 are approved the same as the medical devices, and I have

2970 like this should be different--approached differently, that 2971 the test should be approved and the diagnostics should be 2972 treated differently than medical devices. So do you support 2973 your members' position in that--that they should be handled 2974 differently?

heard from a lot of your AdvaMed Dx members, and they feel

2969

2975 Mr. {Fish.} AdvaMed Dx's position currently is that 2976 currently we are comfortable with FDA's current regulation of 2977 diagnostics. I think one of the issues that has been

2978 recognized is that the diagnostics are different than other 2979 medical devices, and FDA I think has recognized that in terms 2980 of the kind of data and information that it requires to be 2981 provided to approve those diagnostics as safe and effective, 2982 but we are currently comfortable with the existing regulatory system. We--I would say, furthermore, we thank the committee 2983 2984 for its 21st Century Cures Initiative, and as we always have 2985 in the past, if the committee is interested in exploring 2986 further any ideas around FDA's ongoing or changing regulation 2987 of diagnostics, we would be very pleased to work with the 2988 committee on that.

2989 Mrs. {Blackburn.} Great, thank you.

2990 Dr. Behrens Wilsey, I want to come to you. I 2991 appreciated your comments in your testimony so much. Let me 2992 ask you this. You heard Dr. Shuren, and if you were 2993 providing guidance to the FDA as to how they were going to approach their regulation, trying to get some regulatory 2994 2995 certainty into the process, if you were to talk to them about 2996 reining in some of the mission creep that exists there, and 2997 if--also the LDTs, if you were talking to them about the LDTs and how that has impacted health care costs, what would you 2998

2999 say to them?

3000 Ms. {Behrens Wilsey.} We would like to encourage 3001 greater dialogue before--as I mentioned earlier, before 3002 finalization of the guidance, in part, because there has been 3003 such a long period of time in which there has been 3004 enforcement discretion, because this would encourage more 3005 dramatic changes in this area, and because this area is 3006 really not just exciting technologically, but the potential 3007 applications now of the use of these technologies, not just 3008 by good actors but all actors, are becoming increasingly 3009 clearer and very important for the patient. So what we would 3010 really like to see, and what we would encourage by the FDA, 3011 is to work through greater levels of some of the details that 3012 would lay out in advance of any finalization of quidance, some of the very specific questions, many of which have been 3013 3014 raised today in our discussion, so that there is a lot less 3015 that is assumed by how the FDA will approach answering those 3016 concerns and those questions after guidance is finalized, 3017 because at that point in time, the clock starts ticking. At 3018 that point in time, companies' investors, everyone begins to 3019 risk the progress and the opportunity for these types of

3020 technologies, so that the lack of certainty and the judgments 3021 that would occur after that are far less clear than what we 3022 think could occur between now and finalization of guidance. 3023 Mrs. {Blackburn.} Okay, thank you. 3024 I yield back, Mr. Chairman. 3025 Mr. {Pitts.} The chair thanks the gentlelady. 3026 That concludes this first round. We will go to one 3027 follow-up per side. 3028 Dr. Burgess, you are recognized 5 minutes for a follow-3029 up. 3030 Dr. {Burgess.} Thank you, Mr. Chairman. Dr. Behrens Wilsey, just before we leave that concept of 3031 3032 quidance and quidance versus regulation, you heard Dr. 3033 Shuren's response to my question, are we going with guidance 3034 because regulation actually triggers a response from--for the 3035 budget as to the financial impact. So, you know, I guess 3036 this is part of the problem. Why are we here talking about a 3037 regulatory guidance that apparently has been in the making 3038 since either 1976 or 2006, it is hard to follow, why not 3039 proceed with actual--if the onus is so severe, why not 3040 proceed through a regulatory pathway through the--through

that more established pathway, and let us do the economic 3041 3042 analysis that I think, certainly from the investment 3043 community, I think you would welcome that, would you not? 3044 Ms. {Behrens Wilsey.} Independent of rulemaking versus the guidance process, I would say that you could accomplish 3045 3046 the same goal through both mechanisms. One important 3047 distinction being, of course, in rulemaking, the Food and 3048 Drug Administration has to respond to certain questions. On 3049 the question and the issue in the matter, I should say, of 3050 economics, I think that is an important question for 3051 everyone, whether FDA generates the numbers or collaborates 3052 with others in generating those numbers, those are still very 3053 important considerations. In fact, we have discussed whether 3054 we could put our hands on numbers that could be helpful 3055 through this process. So I would say independent of the 3056 process, we would encourage assessment on the economics. 3057 Dr. {Burgess.} But the economic assessment may be 3058 circumvented by the fact that it is done through guidance rather than through regulation. That was my point --3059 3060 Ms. {Behrens Wilsey.} I understand that. 3061 Dr. {Burgess.} --in the earlier question.

3062 Ms. {Behrens Wilsey.} The distinction that I am making 3063 is that if FDA works through a reasonable process, in our 3064 opinion, they could perhaps not precisely end up in the same 3065 position as everyone would like them to through rulemaking, 3066 but we could certainly come much closer to that. Economics 3067 being one of the considerations.

3068 Dr. {Burgess.} Well, unfortunately, they may have given 3069 themselves some enforcement discretion on their own purpose. 3070 Mr. Mertz, let me just ask you a question. It has come 3071 up several times on the issue of scalability at the FDA, and 3072 this--

3073 Mr. {Mertz.} I am sorry?

3074 Dr. {Burgess.} Scalability--

3075 Mr. {Mertz.} Yeah.

3076 Dr. {Burgess.} This--you are--we are talking about a 3077 very broad expansion into an area that is large and growing, 3078 and I think I heard you voice a concern are they actually 3079 ready to do this, and I have that concern and I asked Dr. 3080 Shuren and he assured me that they would, but realistically, 3081 I mean as part of the Cures Initiative we have heard from 3082 people saying, look, one of the big problems with the FDA is

3083 their information architecture is so archaic, they have stuff 3084 that is written on paper records that should be digitized and 3085 in the digital age. So, again, I would ask you, because it 3086 obviously impacts your association a great deal, do you think the FDA is ready for the scale of this undertaking? 3087 3088 Mr. {Mertz.} No, and as we pointed out, and by the way, 3089 Dr. Shuren said we weren't part of the MDUFA III 3090 negotiations, in fact, we were one of the stakeholders, so we 3091 became very familiar with the process and how much funding 3092 they had.

3093 As I mentioned, there are 11,000 complex labs, not 3094 6,000. There are probably tens of thousands of laboratory-3095 developed tests. We know that they only were able to look at 3096 23 clear FDA-approved tests last year. Just the initial 3097 highest-risk tests they are talking about, we had heard some 3098 reports that they may look at 100 highest-risk tests within the first year or so. That would be a 5 time -- a fivefold 3099 3100 increase in the number of PMAs they would be doing in the 3101 first year. There are no--they have said there is no user 3102 fee, so they would have no additional money to do a fivefold 3103 increase in the number of PMAs. So we are concerned it would

3104 not only slow down innovation with LDTs, it could very well 3105 slow down the innovation in the FDA, you know, the regular 3106 manufactured kits, so we are very concerned about that. And 3107 I also--we agree completely that the rulemaking would flush 3108 out the economic impact because until they define what high 3109 risk is, they won't know how many LDTs they are going to have 3110 to look at. Until you know how many LDTs you are going to 3111 look at, you have no idea what the burden is on industry or 3112 the FDA. So I think requiring them to do the economic impact 3113 would really force them to say what they are going to 3114 regulate and how many LDTs they are, and then it will expose 3115 the impact it will have on the laboratory industry and the 3116 FDA. 3117 Dr. {Burgess.} Thank you, Mr. Chairman, and I will

3118 yield back.

3119 Mr. {Pitts.} Chair thanks the gentleman.

3120 Now recognize the ranking member of the committee, Mr.3121 Waxman, 5 minutes for a follow-up.

3122 Mr. {Waxman.} Well, thank you very much, Mr. Chairman.
3123 Dr. Sawyers, Mr. Mertz has testified if there were
3124 problems with LDTs, we would have more publicity about them.

3125 Do you agree with that? Would doctors and patients 3126 necessarily know if tests were not giving good advice for 3127 clinical decisions? 3128 Dr. {Sawyers.} Yeah, I would disagree. I think it is 3129 possible because physicians are so busy and don't know 3130 whether the tests they have ordered is an LDT or an FDA-3131 approved cleared test, that they may not know, and if there 3132 is no requirement for reporting back, how would we know? 3133 So--3134 Mr. {Waxman.} Um-hum. 3135 Dr. {Sawyers.} --I think it is an unknown. 3136 Mr. {Waxman.} And, Dr. Newton-Cheh, how do you respond? 3137 Same question. 3138 Dr. {Newton-Cheh.} I--it is completely opaque. I mean 3139 I think the current environment for the practice of health 3140 care is increasingly complex, and I think physicians, 3141 patients, payers, they are all critical stakeholders here, I 3142 think they really rely on having independent evaluation of 3143 the claims that are associated with diagnostic tests. 3144 Mr. {Waxman.} Thanks. 3145 Mr. Fish, I would like to ask you a couple of quick

3146 questions. One often cited critique of FDA's proposal to 3147 oversee LDTs is that CMS, under its CLIA authority, should 3148 regulate these tests, not FDA. How do you respond to this, 3149 and do you think that CMS regulatory authority for LDTs 3150 should be the sole regulatory authority? 3151 Mr. {Fish.} I think it is important to distinguish 3152 between what an ethical and competent laboratory currently 3153 probably does, as opposed to what CLIA actually requires, and 3154 as Dr. Shuren pointed out, what CLIA currently requires is 3155 vastly different than what FDA requires. CLIA requires that 3156 laboratories follow good processes and practices to ensure 3157 that their personnel are proficient, and that they have 3158 processes in place that ensure the good practices when they 3159 perform their tests, but FDA, on the other hand, requires a 3160 number of aspects of laboratory testing that are not present 3161 in CLIA, including premarket review and approval of tests, it 3162 requires that there be a demonstration not only of analytical 3163 validity but also clinical validity, in other words, is it 3164 meaningful to diagnosis, they require adverse event reporting 3165 and quality systems regulation, and all of these aspects are missing from what CMS does. And given the questions around 3166

3167 what agency is prepared to regulate LDTs, I think the answer 3168 is no agency is conceivably as ready as FDA, and they--that 3169 is the appropriate agency to carry this out. 3170 Mr. {Waxman.} Yeah. Let me ask you about this claim 3171 about increased regulatory oversight stifling innovation. 3172 How do you respond to this claim? I know some members of 3173 your trade association, AdvaMed Dx, have had the experience 3174 of having obtained FDA approval for their LDT, only to find 3175 that the next day a laboratory launches a copy of that LTD 3176 [sic] without undergoing FDA review at all. Please describe your views on the impact that this situation can have on 3177 3178 innovation. 3179 Mr. {Fish.} I would first point out that as a core matter, regardless of how this situation gets reconciled, the 3180 3181 current uncertainty in having two very different paths to 3182 market for the same test is something that shouldn't stand as 3183 a matter of public policy, and it has ripple effects from a 3184 number of different standpoints. It has a ripple effect from 3185 the standpoint of investor certainty that we talked about, it 3186 has an impact on the competition that you just raised of, you know, LDTs coming out that purport to be the same as an FDA-3187

3188 cleared test, it has implications for clinician and patient 3189 transparency as well. So, again, regardless of the decision 3190 that is ultimately made, perhaps by Congress as well, this is 3191 just a situation that currently can't stand.

3192 As far as innovation goes, FDA made a very important 3193 point when it said that it would not enforce regulations with 3194 regard to LDTs that are developed and used in the academic 3195 medical setting. Mr. Mertz referenced this letter that was 3196 sent by a number of leading academic medical institutions. 3197 Shortly thereafter, FDA came out with its framework and 3198 explicitly said we are not worried about the tests that are 3199 being performed in those settings, we are concerned about 3200 standalone, independent laboratories developing tests that 3201 are outside the context of patient care. And those--that is 3202 the test where FDA is concerned. So I think they acknowledged that innovation could continue on LDTs in the 3203 3204 academic medical setting.

3205 Mr. {Waxman.} FDA appears to be looking at prioritizing 3206 those tests with the greatest amount of potential harm to 3207 patients, and exempting a lot of other LDTs that might not be 3208 as serious. Do you think that is a reasonable way to

3209 prioritize and--the cases, or do you think there ought to be 3210 a rulemaking, every LTD ought to be subject to every test and 3211 every evaluation? 3212 Mr. {Fish.} Well, I would first say, regarding 3213 rulemaking, if FDA were to proceed here by rulemaking instead 3214 of by guidance, there would be nothing new to say, it would 3215 simply say and you too, because the regulations already 3216 exist. So it is not clear that there would be any rule to--3217 put forth. And FDA, I think, is taking exactly the right 3218 approach. We have called for years for all diagnostics to be 3219 regulated under a risk-based approach to ensure that the 3220 burdens of regulation are commensurate with the risks 3221 presented by those tests. 3222 Mr. {Waxman.} Yeah. 3223 Dr. Behrens Wilsey, I thought your last few statements 3224 have been very wise. It seems to me what you are saying is 3225 you want to see what FDA is going to do, you are afraid it 3226 could stifle innovation, but you think, handled the 3227 appropriate way, it might not stifle innovation at all, is 3228 that a correct statement? 3229 Ms. {Behrens Wilsey.} Yes. I think even the

3230 improvements that we have seen in the proposed guidance--3231 Mr. {Waxman.} Um-hum. 3232 Ms. {Behrens Wilsey.} --between 2006 and today, we have 3233 already seen some improvements, and we certainly heard from 3234 Dr. Shuren earlier, willingness to hear more, so I think--3235 Mr. {Waxman.} Yes. 3236 Ms. {Behrens Wilsey.} --if we proceeded down a path 3237 that allowed greater transparency, allowed the opportunity 3238 and the time for all parties to discuss the issues, and 3239 actually give some specific answers to some of the questions 3240 that have been raised, I think we would find ourselves in a 3241 very good position. 3242 Mr. {Waxman.} Um-hum. Well, Mr. Chairman, I want to commend you on this 3243 3244 hearing. I think just having this open hearing and getting 3245 different views and hearing concerns, I think, can help FDA, 3246 can help everybody make sure that the right thing is done, 3247 because we don't want to stifle innovation, we do want these 3248 LDTs to continue, but we don't--and you certainly wouldn't 3249 want investors to put money into something that could end up doing nothing, and might even harm people. So let us hope 3250

3251	that this process will continue at FDA and we will get a good
3252	result.
3253	Thank you. Yield back my time.
3254	Mr. {Pitts.} Chair thanks the gentleman.
3255	And on that note, that concludes the questioning at this
3256	time. Members will have follow-up questions. We will send
3257	them to you. We ask that you please respond promptly. I
3258	remind Members that they have 10 business days to submit
3259	questions for the record, and they should submit their
3260	questions by the close of business on Tuesday, September 23.
3261	Very important, informative hearing. Thank you very
3262	much.
3263	Without objection, the subcommittee is adjourned.
3264	[Whereupon, at 12:25 p.m., the Subcommittee was
3265	adjourned.]