

UNITED STATES DISTRICT COURT
DISTRICT OF MASSACHUSETTS

RED WOLF ENERGY TRADING, LLC,)
)
 Plaintiff,)
)
 v.) C.A. No. 19-10119-MLW
)
 BIA CAPITAL MANAGEMENT, LLC,)
 GREGORY V. MOELLER,)
 GROWTHWORKS, LLC,)
 MICHAEL HARRADON, and)
 JON MOELLER,)
 Defendants.)

MEMORANDUM AND ORDER

WOLF, D.J.

September 8, 2022

Table of Contents

I. SUMMARY3

II. SECOND MOTION FOR SANCTIONS7

III. FACTS8

IV. ANALYSIS43

 A. Discovery Obligations.....43

 B. The Misappropriation of Trade Secrets and Unfair Trade Practices Claims.....45

 C. Default Judgment is Justified and the Most Appropriate Sanction for Bia and Moeller's Repeated Violations of Discovery Orders.....47

 D. Bia and Moeller Must Pay Red Wolf's Reasonable Attorneys' Fees and Expenses Concerning the Second Motion for Sanctions69

 E. Harradon and Jon Moeller.....70

V. ORDER71

I. SUMMARY

As the court has repeatedly told defendants Gregory Moeller ("Moeller")¹ and Bia Capital Management, LLC ("Bia") (for purposes of this section "defendants"), this case has generated more meritorious motions to compel and for sanctions against defendants for failure to produce documents than any other case in which this court has presided in more than 37 years. Defendants' repeated misconduct occurred despite two orders to review their document production and, if necessary, supplement it as required by Federal Rule of Civil Procedure 26(e). Moeller twice submitted affidavits representing that he had complied with those orders. Despite increasingly stern warnings by the court that any continued failure to produce required discovery would be severely sanctioned, plaintiff Red Wolf Energy Trading, LLC ("Red Wolf") repeatedly correctly contended that defendants had not produced many required documents. Some of those belatedly discovered documents are strong evidence of the merit of Red Wolf's claims that defendants misappropriated their trade secrets in violation of the federal Defend Trade Secrets Act, 18 U.S.C. §1836 et seq., and the Massachusetts statute prohibiting unfair and deceptive trade practices, Mass. Gen. Laws ch. 93A, §8. At best, defendants'

¹ Both Gregory Moeller and Jon Moeller are defendants in this case. For the purposes of this Memorandum and Order, "Moeller" refers to Gregory Moeller. Jon Moeller is identified by his full name.

repeated failures to produce required documents for three years was in reckless disregard of their duties established by the Federal Rules of Civil Procedure and court orders. This misconduct was extreme. The fact that it continued after stern warnings from the court exacerbates it. Red Wolf has been severely prejudiced by defendants' extreme misconduct. It has also seriously injured the court's ability to manage this case and many others on its docket.

Defendants were required to produce documents in 2019. In response to Red Wolf's allegations that defendants had not produced all required documents, on April 1, 2021, the court ordered defendants to, among other things, "review [G]oogle [S]uite documents . . . which they have already produced and supplement them, and any other responses to requests for discovery, to the extent, if any, necessary under Rule 26(e) of the Federal Rules of Civil Procedure." Apr. 1, 2021 Order (Dkt. No. 112) at 1-2. Moeller subsequently filed a sworn affidavit claiming that all five defendants had complied with that Order. See Apr. 2021 Moeller Aff. (Dkt. No. 113).

On August 31, 2021, the court issued another Order directing defendants to supplement their document production to the extent, if any, necessary to comply with Rule 26(e). See Aug. 31, 2021 Order (Dkt. No. 140). Again, Moeller filed a sworn affidavit on behalf of all defendants claiming to have done so. See Sept. 2021 Moeller Aff. (Dkt. No. 141). Both of Moeller's claims to have

supplemented defendants' production of documents as required by Rule 26(e) proved to be untrue.

Defendants later produced 47 documents in Bia's Google Vault, which is part of Google Suite, that had not been previously produced. The belated production to Red Wolf included some documents that are significant evidence of the merit of Red Wolf's claims that defendants misappropriated Red Wolf's trade secrets and engaged in unfair and deceptive trade practices. Red Wolf filed a Motion for Sanctions based on this belated production (the "First Motion for Sanctions"). The court granted the First Motion for Sanctions and ordered defendants to pay Red Wolf's reasonable attorneys' fees concerning that motion, pursuant to Rule 37(b)(2)(C). It did not, however, exercise its discretion to order any of the sanctions authorized by Rule 37(b)(2)(A), including default judgment. The court also ordered the reopening of the depositions of Moeller and others so they could be questioned concerning belatedly produced documents.

In April 2022, Red Wolf received additional Slack² communications that should have been produced in 2019. After reviewing those documents and taking Moeller's deposition, Red Wolf correctly believed that it still had not received all of the relevant Slack messages.

² Slack is a cloud-based messaging platform.

Therefore, in June 2022, Red Wolf filed a Second Motion for Sanctions, requesting default judgments based on defendants' repeated failure to produce required Slack communications, emphasizing the court's orders that defendants review and supplement their prior productions, and Moeller's sworn claims to have done so. After that motion was filed, in July and August 2022, defendants produced additional Slack messages that Red Wolf should have received in 2019. In addition, after receiving and searching Bia's 2019 Slack archive in August 2022, Red Wolf found many more Slack messages that should have been produced in 2019.

Red Wolf's Second Motion for Sanctions is meritorious. The court would have preferred that discovery be properly completed and that this case be decided on its merits. In an effort to accomplish this, the court extended the deadline for discovery several times and, long after that deadline passed, reopened depositions of key witnesses, including Moeller. Yet additional relevant, in some instances important, documents were discovered after the completion of those depositions. Litigation concerning the Second Motion for Sanctions necessitated the postponement of trial that was scheduled to begin on August 11, 2022.

The court recognizes that entering a default judgment for violation of discovery orders is a drastic sanction. However, in this case it is fully justified and, indeed, necessary to do justice in this case and to deter others from engaging in similar

extreme misconduct.

Therefore, the Second Motion for Sanctions is being allowed. Defaults are being entered against Bia and Moeller on all claims. The parties are being ordered to confer and report concerning what proceedings should be conducted to determine the amount of damages, and the nature of possible injunctive relief, Red Wolf should be awarded.

II. SECOND MOTION FOR SANCTIONS

On June 8, 2022, Red Wolf filed its Second Motion for Sanctions pursuant to Federal Rule of Civil Procedure 37 against Bia and Moeller (for purposes of this section, "defendants"). See Dkt. No. 196 ("Second Mot. Sanctions"); see also Memorandum in Support of Second Motion for Sanctions (Dkt. No. 228, under seal) ("Memo. Second Mot. Sanctions"). Red Wolf seeks various sanctions, including entry of default judgment on all counts against them, based on defendants' alleged repeated and continuing failures to comply with their discovery obligations. See Second Mot. Sanctions at 1-2. More specifically, Red Wolf states that, in April, July, and August 2022, including after trial was scheduled to begin, defendants produced relevant Slack messages that should have been produced in 2019. Therefore, Red Wolf argues, defendants have violated the court's orders concerning discovery issued on April 1, 2021 and August 31, 2021, and failed to fulfill their discovery

obligations under Federal Rule of Civil Procedure 26(e) as well. See id.

Defendants oppose the Second Motion for Sanctions. See Dkt. No. 208 ("Def. Opp. Second Mot. Sanctions"). Defendants admit that they did not produce all of the Slack messages that should have been provided in 2019, but contend that this was not intentional. See id. at 2. Defendants also assert that, in any event, the ultimate sanction of default judgment is unjust and unwarranted. See id. at 11.

III. FACTS

Red Wolf is an energy trading firm that trades virtual electricity products in certain federally regulated energy markets. See Complaint (Dkt. No. 1) at ¶¶1, 16. These markets include, among others, the California Independent System Operator ("CAISO"). See id. at ¶¶19, 20. Red Wolf "seeks to predict energy needs in the day-ahead, or forward market, that align with energy needs that occur in the real-time market" and "uses algorithms as template transactions at specific locations that can be modified based on daily external factors, such as weather." Id. at ¶16.

This case arises from defendants' alleged "scheme to create and develop a competing business by unlawfully using and taking the software, trade secrets, and other assets of Red Wolf." Id. at 1. Red Wolf alleges that while employed by Red Wolf, Christopher Jylkka acquired Red Wolf's confidential information and trade

secrets and disclosed them to defendants, who "are now improperly using [them] at various companies including . . . [defendants] Bia and GrowthWorks." Id. at ¶72.

Red Wolf's alleged trade secrets include its "full-service platform that includes a risk management function in addition to data warehousing, invoicing, ISO/RTO settlement breakdown and distribution, credit tracking, real time trade settlement, back office, front office, and compliance functions." Id. at ¶24; see also Red Wolf Description of Trade Secrets and Theory of Damages (Dkt. No. 120). Among other things, Red Wolf's software "allows traders to mock, or paper trade, within the program so that future profitability of a trade model or algorithm can be tested without actually entering the trade into the market." Complaint at ¶31. The software also allows traders to back-test transactions for profitability. See id. at ¶32. In addition to software, Red Wolf alleges that its trade secrets include its proprietary trading algorithms. See id. at ¶¶67-70. Red Wolf also has what it characterizes as a unique proprietary User Interface that facilitates performing the foregoing functions.

From 2015 to January 8, 2019, Red Wolf employed Jylkka as a trader. In his employment agreement with Red Wolf, Jylkka acknowledged that he had access to Red Wolf's trade secrets and confidential, proprietary information, and agreed not to disclose or use it except in connection with Red Wolf activities. See

Employment Agreement, Ex. A to Jan. 17, 2019 Declaration of Wesley Allen (Dkt. No. 6) ("Employment Agmt.") at 6-7. Jylkka also agreed not to consult with, participate in, or act on behalf of any business that competes with Red Wolf. Id. at 7.

Red Wolf alleges that, from Summer 2017 until December 2018, Jylkka used Red Wolf's proprietary software to place mock trades on behalf of defendants. See id. at ¶¶47-49, 55-56. According to Red Wolf, Jylkka placed the mock trades in order to test trading strategies for GrowthWorks and what later became Bia in order to facilitate Bia's entry into the market as a competitor of Red Wolf. See id. at ¶60-65, 72, 82. Jylkka allegedly "tested at least five model algorithms using Red Wolf's proprietary software and algorithms" on behalf of defendants. Id. at ¶56. Red Wolf also alleges that, in mid-December 2018, Jylkka placed actual trades on behalf of defendants, which "placed Red Wolf's capital at significant risk." Id. at ¶52. According to Red Wolf, Jylkka placed a total of 3,598 mock trades and 1,693 actual trades on behalf of defendants rather than Red Wolf. See id. at ¶53. By November 30, 2018, Jylkka had allegedly become a member of Bia. See id. at ¶58.

On January 17, 2019, Red Wolf filed its original Complaint against defendants Bia, GrowthWorks, LLC ("GrowthWorks"), a company that incubated what later became Bia, Moeller, his brother Jon Moeller, and Bia employees Michael Harradon, Eric Brown, and Brian Voorheis. See Dkt. No. 1. Red Wolf alleged primarily that

Jylkka misappropriated its trade secrets and that his codefendants unlawfully used them in violation of the federal Defend Trade Secrets Act, 18 U.S.C. §1836 et seq. (the "DTSA"), and the Massachusetts statute prohibiting Unfair and Deceptive Trade Practices, Mass. Gen. Laws ch. 93A. See id. at 10-15. Red Wolf requested money damages and injunctive relief. See id. at 15-16.

With its Complaint, Red Wolf filed a Motion for a Temporary Restraining Order and Preliminary Injunction. See Dkt. No. 3. Red Wolf stated that "[a]t its core, this case is about Defendant Jylkka conspiring with the other Defendants to misuse Red Wolf's assets in the course of secretly developing a competing business - while Defendant Jylkka was still employed by Red Wolf." Memorandum in Support of Motion for Temporary Restraining Order and Preliminary Injunction (Dkt. No. 4) at 1. Among other things, Red Wolf sought to enjoin defendants from using or disclosing any of Red Wolf's confidential information, including Red Wolf's proprietary trading strategies. See Dkt. No. 3 at 1-2.

On January 23, 2019, defendants filed an Opposition to Red Wolf's Motion for a Temporary Restraining Order and Preliminary Injunction, which included an affidavit from defendant Moeller, the founder and managing director of both Bia and GrowthWorks. See 2019 Moeller Aff. (Dkt. No. 19-2). Moeller stated that he initially involved Jylkka with Bia and GrowthWorks as a "potential customer for [Bia's] envisioned product." Id. at ¶22. Moeller also stated

that Bia's "[b]lack testing and mock trading was accomplished exclusively with [Bia]-developed software and public data." Id. at ¶20. He also stated that "Jylkka did mock some of our trade recommendations and communicated the results. This information was not needed or used in development in any way." Id. at ¶35 (emphasis added).

Defendant Harradon also submitted an affidavit in support of defendants' Opposition to the Motion for a Temporary Restraining Order and Preliminary Injunction. See Jan. 28, 2019 Harradon Aff. (Dkt. No. 19-2) ("2019 Harradon Aff."). Harradon is a member of Bia who worked on the development of Bia's evolving trading algorithm. See id. at ¶¶1, 8. In his affidavit, Harradon stated that Jylkka "did not assist in this effort in any way, and in fact he provided no assistance to me in developing the algorithm." Id. at ¶21 (emphasis added). Harradon went on to state that he "received no information from Chris [Jylkka] through his review/use of the algorithm's trade recommendations that I incorporated into or used to modify or improve the Bia algorithm." Id. at ¶25 (emphasis added).

The court denied Red Wolf's Motion for a Temporary Restraining Order and Preliminary Injunction. See Feb. 7, 2019 Tr. (Dkt. No. 316) at 76-84; Feb. 7, 2019 Order (Dkt. No. 37). Relying in part on Moeller and Harradon's representations, the court found that Red Wolf was not likely to prove that it had been or would be

irreparably harmed by any misuse of its trade secrets, and that the public interest weighed in favor of allowing Bia to continue to operate during the pendency of this case. See Feb. 7, 2019 Tr. (Dkt. No. 316) at 76-84. The court stated, however, that this decision was "based on limited information as of this time" and was not a "prophecy as to how this case is going to come out." Id. at 77. Evidence developed in discovery would be important to the ultimate determination of the merit of Red Wolf's claims for money damages and injunctive relief.

At the inception of the case the court perceived the major issue to be whether Bia had copied Red Wolf's proprietary trading algorithm and incorporated it in its own, rather than only used Red Wolf's algorithm to develop its own in violation of the DTSA. Therefore, to encourage a prompt resolution of the case, the court suggested that the parties agree on an expert to review the Red Wolf and Bia algorithms and report on the similarities and differences between them. The court provided time for the parties to do so before discovery began. See Feb. 7, 2019 Order (Dkt. No. 37). However, by August 2019, the parties had not agreed on an expert to conduct the comparison. See Dkt. Nos. 41, 42. Therefore, the court established a schedule for discovery. See Aug. 1, 2019 Scheduling Order (Dkt. No. 54). In another effort to have the case resolved promptly, the court ordered that all discovery be completed by December 31, 2019. See id. at 2.

On October 3, 2019, Red Wolf made its First Request for Production of Documents to Bia. See Dkt. No. 151-1 (the "2019 RFP"). Red Wolf requested information concerning whether Jylkka had misappropriated Red Wolf's confidential information, including trade secrets, and whether his co-defendants had unlawfully used such confidential information in developing Bia's competing business. Among other things, Red Wolf requested:

1. All communication[s] sent or received between January 1, 2015 and the present between Christopher E. Jylkka ("Jylkka") and Gregory V. Moeller ("Moeller"), Michael Harradon ("Harradon"), Jon Moeller, Eric Brown, or Brian Voorheis.

2. All communications sent or received, including attachments, concerning any of the following:

- a. Bia
- b. Growth Works
- c. Red Wolf (RedWolf, RW, RWET)
- d. God's Plan (GP)
- e. BCM
- f. Abramyan
- g. Fractional
- h. Hedge fund
- i. CAISO
- J. Test or testing Bia software, processes or algorithms
- k. Mock trades or trading
- l. CFTC
- m. FERC

* * *

24. All communication with or between the named defendants or anyone working for, with, or on behalf of Bia via Slack, including attachments and direct messages concerning the following:

- a. Bia
- b. Growth Works
- c. Red Wolf (RedWolf, RW, RWET)
- d. God's Plan (GP)

- e. BCM
- f. Abramyan
- g. Fractional
- h. Hedge fund
- l. CAISO
- J. Test or testing Bia software, processes or algorithms
- k. Mock trades or trading
 - 1. CFTC
- m. FERC

Id. at 5-6, 7-8. "Communications" were defined in the 2019 RFP as "the transmittal of information (in the form of facts, ideas, inquiries, or otherwise), and includes all correspondence and emails." Id. at 1.

Defendants produced documents in response to the 2019 RFP on about November 15, 2019 (the "2019 Production").

On January 27, 2020, the court granted the parties' request to extend the deadline for completion of discovery to October 30, 2020. See Dkt. No. 63.

On March 11, 2020, Red Wolf filed a Motion to Compel Documents. See Dkt. No. 66. Red Wolf contended that five months after its October 2019 request for production of documents it had still not received all of the relevant documents it had requested. More specifically, even after conferring with defendants' counsel and narrowing some requests, Red Wolf alleged that it had not received all requested communications with Jylkka between January 8, 2019 and January 31, 2019, and "Google Suite" documents that were linked to other documents that had been produced. See

Memorandum in Support of First Motion to Compel (Dkt. No. 67) at 1-2. Red Wolf also stated that it had not received all documents relevant to determining the veracity of Harradon's sworn assertion that Jylkka did not assist in the effort to create Bia's trading algorithm "in any way." 2019 Harradon Aff. at ¶35; see Mar. 31, 2021 Tr. (Dkt. No. 116) at 44.

On December 7, 2020, Red Wolf filed an motion for leave to file an amended complaint, which defendants opposed. See Dkt. Nos. 92, 93.

Red Wolf subsequently reached a settlement with Jylkka, who is now no longer employed by Bia, and stipulated to the dismissal with prejudice of all claims against him. See Dkt. No. 83.

On February 19, 2021, while Red Wolf's Motion to Amend and Motion to Compel were pending, defendants filed an opposed motion for summary judgment on Red Wolf's original Complaint. See Dkt. No. 97. Defendants asserted that Red Wolf had "provided no evidence of any trade secrets that are at issue, much less that the Defendants misappropriated them." Id. at 2 (emphasis added). In response, Red Wolf requested that the court deny or defer consideration of the motion for summary judgment "until [Red Wolf] has had a reasonable opportunity to take meaningful discovery on facts essential to justify its opposition, and obtain rulings on the outstanding motions." Dkt. No. 98 at 4.

On March 31, 2021, the court held a hearing on the pending

motions. See Mar. 31, 2021 Tr. (Dkt. No. 116) at 47-48. The court denied defendants' Motion for Summary Judgment and Red Wolf's Motion to Amend the Complaint without prejudice. See Apr. 1, 2021 Order (Dkt. No. 112) at 1.

In addition, the court allowed Red Wolf's First Motion to Compel in part. It found that communications between Jylkka and Bia between January 8, 2019 and January 31, 2019 were discoverable because "the fact that there was a . . . threat of a complaint [being filed] on January 8th doesn't mean there's not relevant evidence afterwards." Mar. 31, 2021 Tr. (Dkt. No. 116) at 41.

In addition, regarding the Google Suite documents requested by Red Wolf, the court instructed the defendants to:

[T]ake this period and see whether [there are] any responses that you need to supplement because, inadvertently, this wasn't disclosed before. That should give the plaintiff everything to use at the depositions and avert discovery disputes. I can't remember the last time I spent this much time on a discovery dispute or scheduling dispute.

Id. at 47. The court also informed the parties that resolving discovery disputes in this case is "an imposition on my ability to manage my docket and deal with other cases." Id. at 48. The court warned defendants that if they did not produce all required documents and information they could be sanctioned, stating "[i]f it turns out they didn't produce everything, we've got issues about why not and sanctions. That's what I'd like to avoid." Id. at 45.

Therefore, the court ordered defendants to "review" the

discovery that had been produced "carefully" to determine whether the prior productions were incomplete and needed to be supplemented. Id. at 56. The court also instructed defendants to file an affidavit stating that the review had been conducted and additional documents had been disclosed, or stating that there were not additional documents to be produced. See id. at 56-57. The court added that it wanted "the record to be clear and clean" before the depositions it ordered be taken by May 17, 2021. Id. at 57.

The next day, the court memorialized its ruling in a written Order, stating that, by April 16, 2021, defendants shall:

(1) produce all communications between defendants and Christopher Jylkka from January 17, 2019 to January 31, 2019; (2) review the google suite documents and documents in the possession of defendant Michael Harradon which they have already produced and supplement them, and any other responses to requests for discovery, to the extent, if any, necessary under Rule 26(e) of the Federal Rules of Civil Procedure; and (3) file an affidavit addressing its compliance with this Order and obligations under Rule 26(e).

Apr. 1, 2021 Order (Dkt. No. 112) at 1-2 (emphasis added).

Federal Rule of Civil Procedure 26(e) provides that a party must supplement or correct its disclosure or response:

(A) in a timely manner if the party learns that in some material respect the disclosure or response is incomplete or incorrect, and if the additional or corrective information has not otherwise been made known to the other parties during the discovery process or in writing; or

(B) as ordered by the court.

(emphasis added).

The April 1, 2021 Order required defendants to review the documents that had been produced and to supplement the production, if necessary, concerning Google Suite documents expressly, and all other responses to requests for production, which included Slack messages. On April 14, 2021, Moeller filed an affidavit on behalf of defendants addressing their compliance with the April 1, 2021 Order and Rule 26(e). See Apr. 2021 Moeller Aff. (Dkt. No. 113). Moeller "affirm[ed] Defendants' compliance with the April Order[,]" and stated that he had, "with counsel, worked to gather documents responsive to [Red Wolf's document] requests in the past and did so in connection with the April Order[.]" Id. at ¶¶3-4. Among other things, Moeller also stated that he had "reviewed our Slack communications and provided all Slack channel communications where Mr. Jylkka was a participant for the January 17, 2019 through January 31, 2019 period to counsel." Id. at ¶10 (emphasis added). Therefore, the court understood that defendants had reviewed and produced all Slack communications involving Jylkka from January 1, 2015 to January 31, 2019, and all Slack communications required to be produced in response to other requests for documents as well.

Based on the understanding that document production was complete, Red Wolf took depositions of Jylkka, Moeller, and Harradon before the May 27, 2021 deadline ordered by the court. See Apr. 1, 2021 Order (Dkt. No. 112) at 2; Dkt. No. 118 (electronic

order allowing extension of deadline until May 27, 2021).

The court allowed Red Wolf's assented to Motion to Amend its Complaint on July 1, 2021. See Dkt. No. 127. Red Wolf filed an Amended Complaint on July 6, 2021. See Amended Complaint (Dkt. No. 129). The Amended Complaint did not add any new parties or claims, eliminated Brian Voorheis and Eric Brown as defendants, and, as a result of their settlement, did not include the three counts against Jylkka which were pled in the original Complaint. See id.; Original Complaint (Dkt. No. 1).

On August 17, 2021, Red Wolf filed proposed a schedule for future events and raised additional issues concerning discovery. See Dkt. No. 135. Red Wolf stated that, contrary to Moeller's representations in his April 14, 2021 affidavit, "it is clear from the depositions and a further review of the evidentiary record that not all of those relevant Slack channels³ as requested by Plaintiff's Document Requests were produced to Plaintiff by Defendants' counsel." Id. at 2.

On August 26, 2021, the court held a hearing to address how the case should proceed. See Aug. 26, 2021 Tr. (Dkt. No. 148). During that hearing, the court stated that it was not inclined to grant Red Wolf additional discovery, but explained that, "if [Red Wolf has] made requests previously for documents or

³ A Slack "channel" is a discussion thread, usually involving specific topics or groups.

interrogatories for information that would cover the Slack channels, the defendants have an obligation to supplement any discovery if it's materially incomplete or incorrect." Id. at 7. Defendants' counsel stated that "Slack was searched the same way emails were searched using terms provided by [Red Wolf], and we produced things that resulted from that search." Id. at 9.

The court then ordered defendants to "either provide anything required by Rule 26(e)(1), . . . and to file an affidavit that says, 'We've supplemented by providing this,' or, 'There's nothing further required by Rule 26(e)(1).'" Id. at 10. Defendants' counsel pointed out that defendants had previously provided such an affidavit in April 2021 and stated that she did not think there would "be anything new for us to do." Id. However, she stated that she would "confer with [her] client and be sure there's nothing that we missed[.]" Id.

On August 31, 2021, the court issued an Order directing defendants to "supplement their document production to the extent, if any, necessary under Federal Rule of Procedure 26(e) and file an affidavit addressing their compliance with this Order and obligations under Rule 26(e)." Dkt. No. 140.

On September 7, 2021, Moeller filed an affidavit on behalf of all defendants concerning their compliance with the August 31, 2021 Order and Rule 26(e). See Sept. 2021 Moeller Aff. (Dkt. No. 141). Moeller stated "[i]t is my belief that my fellow defendants

and I conducted a good faith search for relevant, responsive documents, as explained to Plaintiff's counsel in written discovery objections and responses and my prior affidavit. We have made no supplemental production, as I do not believe, in consultation with my counsel, there is any further supplementation required under Rule 26(e)." Id. at ¶¶4-5. Moeller did not state that defendants had, after the August 31, 2021 Order, done any additional review of the documents produced, including Slack messages, to assure that there were no required documents that had previously been overlooked. The court understands they did not.

On November 1, 2021, Red Wolf filed a Motion to Compel production of the entirety of Slack communications "sent or received between January 1, 2015 and January 31, 2020 between Jylkka and Greg Moeller, Harradon, Jon Moeller, Brown, or Voorheis as initially and repeatedly requested" pursuant to Request Number 1 from its 2019 RFP. Second Mot. Compel (Dkt. No. 150) at 2.

Defendants opposed the Second Motion to Compel, arguing that the parties had agreed to narrow Request Number 1 to require production of messages between Jylkka and Harradon, Jon Moeller, Brown, or Voorheis only if they corresponded to an agreed-upon list of topics, or search terms. See Opp. Second Mot. Compel (Dkt. No. 157) at 4-6. According to defendants, the search terms were terms (c)-(m) of Request Number 2 of the 2019 RFP (the "Search Terms"). See id. Therefore, defendants maintained they were not

required to produce all Slack communications between Jylkka and Harradon, Jon Moeller, Brown, or Voorheis, but only Slack communications between those parties if they contained a Search Term. See id. In their surreply, defendants argued that Request Number 24, which specifically requested Slack messages, was also limited by the Search Terms in Request Number 2. See Surreply in Support of Opp. Second Mot. Compel (Dkt. No. 164) at 1-3.

In connection with defendants' Opposition, Moeller filed another affidavit. In it he stated that in 2019 there was "no ready mechanism" to search and produce Slack messages. Nov. 9, 2021 Moeller Aff (Dkt. No. 157-3) at ¶5. Therefore, Moeller said he used a consultant to write a program to search and produce Slack messages in a readable format. See id. at ¶10. In deciding what to produce, Moeller stated that:

[I]n consultation with my counsel . . . we developed a search protocol that would add context to the messages containing search term hits. Specifically, the search protocol which I had a consultant experienced in the language write to conduct our final search of Bia's Slack history pulled (a) all messages with search term hits, plus both (b) ten messages around that message (five prior and five after) and (c) the entire thread (if it was not already captured by the ten messages around the hit protocol).

Id. (emphasis in original).

As explained below, the "consultant" was Minas Abramyan, who lived in Kazakhstan, had no experience with Slack, and would be compensated for his work with equity in Bia rather than money.

Also explained below, defendants produced only five messages before and after messages that contained Search Terms, and not the entire threads where necessary to provide important context.

On November 29, 2021, while the Second Motion to Compel was pending, Moeller filed a supplemental affidavit pursuant to Rule 26(e), reporting that "additional documents responsive to [Red Wolf's] requests [were] discovered during the process of identifying and providing information to Bia's expert witness in late November 2021." Dkt. No. 161. The additional documents included 47 documents found in Bia's Google Vault drive. See id. at 2. Google Vault is part of Google Suite and, therefore, documents in it were among those the court directed defendants search for and produce in the April 1, 2021 Order. See Dkt. No. 112 at ¶2.

The 47 documents included "14 still images of Red Wolf's system, and one excel file that appears to be an export of certain data from Red Wolf's software . . . which the metadata indicate [Jylkka] created." Dkt. No. 161 at ¶8. The belated production included a PowerPoint presentation Jylkka prepared in about December 2018, and provided to Moeller and Harradon. See id. at ¶10. The PowerPoint includes screenshots of Red Wolf's proprietary software and User Interface being used to graph the results of Jylkka's tests of trade recommendations generated by Bia's evolving algorithm. Red Wolf contends that the PowerPoint was

prepared to assist Bia in improving its trading algorithm to the point where it was functional. See Mar. 22, 2022 Tr. (Dkt. No. 184) at 27. The PowerPoint is important evidence that undermines the credibility of Moeller's sworn statement that information provided by Jylkka was "not needed or used in development in any way," 2019 Moeller Aff. at ¶35, and Harradon's sworn statement that Jylkka "did not assist" in developing Bia's algorithm "in any way," 2019 Harradon Aff. at ¶21. It is, therefore, significant evidence of the misappropriation of trade secrets and unfair trade practices that Red Wolf alleges.

Moeller stated that these documents were not provided earlier because of an error in Bia's original search. See Dkt. No. 161 at 2-3. More specifically, he claimed that "Eric Brown, who conducted Bia's search for electronic records, inadvertently conducted a search of only Bia's Gmail and not our other electronic records stored in Google Vault." Id. at 2. Moeller did not address why the Google Vault documents were not found pursuant to the court's earlier Orders, and Moeller's sworn statements that a review had been conducted, any required supplementation had been made, and defendants' document production was complete.

Based on this belated production, Red Wolf filed a Motion for Sanctions against Bia, Moeller, and their counsel, Megan Deluhery and Christopher O'Hara of Todd & Weld LLP. See First Mot. Sanctions (Dkt. No. 168). Plaintiff argued that sanctions were warranted

pursuant to both Federal Rules of Civil Procedure 37(b)(2) and (c)(1) because defendants had disregarded their obligation to supplement discovery under Rule 26(e) and failed to obey the court's Orders. See Red Wolf Memo. in Support of First Mot. Sanctions (Dkt. No. 169) ("Mem. First Mot. Sanctions") at 1-2, 6-7. Red Wolf noted that the court had twice ordered defendants to review their productions of documents and ensure compliance with Rule 26(e), see Apr. 1, 2021 Order (Dkt. No. 112); Aug. 31, 2021 Order (Dkt. No. 14), and Moeller filed two affidavits asserting that defendants had complied and no further supplementation was required. See Apr. 2021 Moeller Aff. (Dkt. No. 113); Sept. 2021 Moeller Aff. (Dkt. No. 141). Red Wolf also emphasized the importance of the belatedly produced documents to its claims, exemplified by, but not limited to, the PowerPoint. See First Mot. Sanctions at 1-2; Mem. First Mot. Sanctions at 6.

Red Wolf requested that the court order Bia, Moeller, and their attorneys to: (1) conduct a final and thorough search of Bia's files and produce any relevant documents they find; (2) produce Moeller, Harradon and Jylkka for additional depositions, and pay associated attorneys' fees and costs to Red Wolf; (3) pay for the costs associated with revision and supplementation of Red Wolf's expert reports related to the belatedly produced documents; and (4) pay Red Wolf reasonable attorneys' fees associated with the First Motion for Sanctions. See id. at 2.

On March 22, 2022, the court held a hearing concerning Red Wolf's Second Motion to Compel and First Motion for Sanctions. The court allowed Red Wolf's Second Motion to Compel and ordered defendants to produce all Slack communications between Jylkka and Moeller, Harradon, Jon Moeller, Brown, or Voorheis from January 1, 2015 to January 31, 2019, subject to the "Attorney's Eyes Only" provision in the Protective Order in this case. See Mar. 23, 2022 Order (Dkt. No. 182)⁴. The court did not limit this production based on the Search Terms. As agreed by Red Wolf during the hearing, this production was to be made at Red Wolf's expense. See id.; Mar. 22, 2022 Tr. at 52. During the hearing, the court explained that it was "granting the motion to compel but I'm not ordering, at the moment anyway, the defendants or the attorneys to pay the reasonable costs including attorney's fees relating to this motion or that production because [Red Wolf] and defense

⁴ On March 14, 2019, the court entered in slightly modified form the parties' Stipulated Confidentiality and Protective Order, which allowed them to designate some information as "Confidential" and some Confidential information for "Attorneys' Eyes Only." See Dkt. No. 40. That Order authorized the parties to file submissions containing Confidential information under seal with redacted copies for the public record. Id. Such protective orders may be issued for good cause. See Fed. R. Civ. P. 26(c); Anderson v. Cryovac, Inc., 805 F.2d 1, 14 (1st Cir. 1986). However, there is also generally a right of public access to records which the court considers in adjudicating a case. See F.T.C. v. Standard Fin. Mgmt. Corp., 830 F.2d 404, 412-13 (1st Cir. 1987). The court finds that there is now under seal information for which there is not now good cause to be impounded. Therefore, the court is referencing some such information in this Memorandum, which will be made part of the public record in this case.

counsel didn't have a meeting of the minds on what would be produced under [R]equest 1." Mar. 22, 2022 Tr. at 56; see also id. at 41-42. Later in the hearing, the court again stated that: "I've given [defendants] the benefit of great doubt with regard to the Slacks . . . I said there was a failure of meeting of the minds. I could have reasonably decided that the other way." Id. at 67.

With regard to the First Motion for Sanctions, the court found that defendants "violated the April 1, 2021 Order which required defendants to, among other things . . . 'review the [G]oogle [S]uite documents and documents in the possession of defendant Michael Harradon which they have already produced and supplement them, and any other responses to requests for discovery, to the extent, if any, necessary under Rule 26(e) of the Federal Rules of Civil Procedure . . . [and] file an affidavit addressing its compliance with this Order and obligations under Rule 26(e).'" March 23, 2022 Order (Dkt. No. 182) (quoting Apr. 1, 2021 Order (Dkt. No. 112)). The court stated that "[d]efendants' failure to disclose the Google Vault documents was not substantially justified, and there [were] no other circumstances that [made] an award of expenses unjust." Id.

Therefore, the court allowed in part Red Wolf's motion and ordered that defendants pay the reasonable expenses incurred by Red Wolf in making the First Motion for Sanctions. See id. at 2-3. Acting with restraint, the court did not exercise its discretion

to also impose sanctions, including default judgment, pursuant to Rule 37(b)(2)(A).

The court did order the reopening of depositions of Jylkka, Moeller, and Harradon to allow Red Wolf to question them concerning the 47 Google Vault documents produced in November 2021, after the extended deadline for completion of depositions and fact discovery, and any Slack communications Red Wolf received as a result of the Second Motion to Compel. See id. at 3.

In addition, at the March 22, 2022 hearing, the court more emphatically again warned defendants of the risk of serious sanctions if violations of their discovery obligations were repeated. It stated:

I'm quite concerned that that PowerPoint wasn't disclosed. And I'm not satisfied . . . I don't want to get an answer from Mr. Moeller, well, we looked for all of this last year and we turned over what we found last year. Look again, because these are court orders. If they're violat[ed] and I find it's willful, they can be punished by contempt. Then you're not talking about paying money. It can be criminal contempt if there's clear and convincing evidence that it's willful. Somebody can get locked up. I told you I rarely have a discovery dispute. I've spent more time on discovery disputes in this case than I may have certainly in any case in my 37-year career.

Mar. 22, 2022 Tr. at 46 (emphasis added). Later in the hearing, the court also told the defendants that: "I just don't want to get to the point where there are more documents. This has got to end." Id. at 45. The court added: "I want to be clear about this. This case should be over by now and now it's getting reopened." Id. at

57. In addition, the court explained to defendants that "this is not a game of hide and seek. . . . I issue an order and you have to disclose [the required documents]." Id. at 74.

In April 2022, defendants provided Red Wolf with what they represented to be all Slack communications between Jylkka and Moeller, Jon Moeller, Harradon, Brown, or Voorheis from January 1, 2015 to January 31, 2019 (the "April 2022 Production"). Upon receipt of the April 2022 Production, Red Wolf discovered that it contained additional Slack messages containing Search Terms that had not been previously produced. See Second Mot. Sanctions (Dkt. No. 196); Mem. Second Mot. Sanctions (Dkt. No. 228, under seal).

During Moeller's reopened deposition on May 17, 2022, he testified that these Slack messages were omitted from earlier productions due to a mistake made by Abramyan, the independent contractor in Kazakhstan, who wrote a program to search and produce Bia's Slack messages. See Excerpt of May 17, 2022 Gregory Moeller Deposition Tr. (Dkt. No. 197-2) at 21-22, 35-39, 189-90 ("Moeller 2022 Dep. Tr."). Moeller also stated that Abramyan was not paid for this work, but instead received equity in Bia. See id. at 38, 190.

In addition, Moeller testified that "the reason we -- one of the reasons we chose to go with our own Java programmer is because of a limited budget" and Bia could not afford a "top tier firm[]" to do the search. Id. at 64, 189. Moeller also claimed that he

tried and could not find any outside vendors who could do the work. See id. at 13. Moeller testified that he consulted former defendant Brown, who had professional expertise in "discovery stuff," and Brown said that he was not aware of any tools that could be used to search Slack messages. See id. at 9, 15-16. Moeller stated that he spoke to his attorney and "understood [that she] confer[red] with a litigation data support vendor about how to handle Slack messages." Id. at 27. He did not disclose that, as his attorney later reported, she had at the outset of the case found a vendor who could produce an Excel sheet of messages containing Search Terms. See Aug. 10, 2022 Tr. (Dkt. No. 306) at 92-93.

In addition, Red Wolf's counsel asked Moeller, "[a]t the time you wrote either of [the April 14, 2021 and September 7, 2021 affidavits stating that no supplementation to discovery was required] did you ever go back and actually research through Slack to see if you had actually produced everything or not?" Id. at 43. Moeller responded that he "had done some spot checking[.]" Id. at 43.

By May 20, 2022, Red Wolf completed the reopened depositions of Moeller, Jylkka, and Harradon. See May 4, 2022 Order (Dkt. No. 189) (allowing extension of deadline for depositions until May 20, 2022). The court also allowed Red Wolf's request to depose Brown concerning the belatedly produced Google Vault documents. See May 9, 2022 Order (Dkt. No. 191).

During Brown's deposition, Red Wolf's counsel asked him about his experience with Slack. See Excerpt of May 20, 2022 Eric Brown Deposition Transcript (Dkt. No. 197-8) at 29-32. Brown testified that he was "not familiar with [Slack.]" Id. at 30. Contradicting Moeller's testimony, Brown said that when Moeller asked him about searching Slack, he told him: "I really don't know enough about it to really be able to give him any guidance on how to search that. . . . I told him, you know, I wasn't familiar enough with the product to be able to really know." Id. at 31.

On June 8, 2022, Red Wolf filed a Second Motion for Sanctions, alleging that April 2022 Production of Slack communications revealed further failures to produce required documents. See Second Mot. Sanctions (Dkt. No. 196); Memo. Second Mot. Sanctions (Dkt. No. 228, under seal). Red Wolf asserted that the April 2022 Production contained "hundreds of 'new' Slack messages that contained the search terms initially applied by Defendants, including 'Red Wolf' and 'RW' that had not been previously produced in this litigation." Second Mot. Sanctions at 1. Red Wolf requested entry of default judgment on all counts against Bia and Moeller, among other sanctions. See id. at 2.

On June 8, 2022, the day that Red Wolf filed its Second Motion for Sanctions, the court held a pretrial conference. See June 8, 2022 Tr. (Dkt. No. 203). At that conference, the court addressed defendants concerning the Second Motion for Sanctions, stating:

[T]his is risky business and it's high stakes. I give an order, you have to obey the order. You file something under oath, it has to be true . . . -- and this goes both sides [] -- it's not just about money, and it's not a game.

And as I said, I've never in 37 years had a civil case that has had so many issues of sanctions and so many time[s] I've had to compel something and a case where I tried to be as thorough as I know how to be . . . in ordering [defendants to determine whether] everything [has] been disclosed, and [had defendants] provide affidavits that [they have] looked again, everything's been disclosed. . . . I'll read the response, of course[.] I'll consider the response to the request for sanctions[. B]ut it appears like there's highly relevant information that wasn't produced in the many years this case has been litigated, despite the careful attention that's been paid to compelling discovery.

And there may not be individual liability in the case on the merits, but there's individual accountability for affidavits that are filed under oath. There can be financial sanctions, and they'd have to be paid by the individual. And there's [] conceivable criminal penalties as well if there's a knowingly false material statement that's been made to a court under oath. So you want to really be fastidiously careful in the future, and hopefully you were in the past.

June 8, 2022 Tr. at 62-63.

The court scheduled a hearing on Red Wolf's Second Motion for Sanctions and pretrial matters for August 10, 2022, and trial to begin on August 11, 2022. See June 9, 2022 Order (Dkt. No. 200); Aug. 4, 2022 Order (Dkt. No. 274).

Defendants filed an Opposition to the Second Motion for Sanctions on June 22, 2022. See Dkt. No. 208 ("Def. Opp. Second Mot. Sanctions"). Although defendants "admit that the production of Slack messages they made early in this litigation" was not

complete, they maintain that this resulted from an inadvertent error in Abramyan's programming of which defendants were unaware. Id. at 2. Defendants also submitted an affidavit from Abramyan which describes his search of defendants' Slack messages. See Abramyan Aff. (Dkt. No. 208-1).

Red Wolf's Second Motion for Sanctions was fully briefed on June 29, 2022. See Dkt. No. 229. However, on July 26, 2022, Red Wolf filed a motion for leave to revise its Reply, explaining that defendants "produced additional and directly relevant Slack messages on July 23, 2022." Dkt. No. 250.

In its revised Reply in Support of its Second Motion for Sanctions, Red Wolf stated that, while preparing for trial, it discovered more inconsistencies in defendants' Slack productions. See Dkt. No. 252 ("Reply Second Mot. Sanctions") at 2. More specifically, Red Wolf discovered that the April 2022 production did not include some messages that were produced in the 2019 Production and raised this issue with defendants' counsel. See id. Defendants then conducted another search of Bia's Slack messages and produced 56 additional Slack messages, including messages containing the Search Term "CAISO" and 10 surrounding messages which had not been previously produced (the "July 2022 Production"). See id.; see also Defendants' Surreply to Second Motion for Sanctions (Dkt. No. 270) at 5-6. Red Wolf's revised reply requested additional relief in the form obtaining a copy of

Bia's original 2019 Slack data archive (the "2019 Slack Archive") to be searched by Red Wolf's vendor. See id. at 11.

On August 3, 2022, Red Wolf's attorney filed an affidavit verifying the facts in its revised Reply in Support of its Second Motion for Sanctions and describing the most important Slack messages it references, as well as the prejudice Red Wolf alleges it has suffered as a result of their belated production. See Dkt. No. 277-7, under seal. Red Wolf stated that "[a] review of the [July 2022 Production] shows that the missing documents are relevant and bear directly on one of the more contested issues in this case: whether or not Jylkka provided meaningful assistance to Greg Moeller and Michael Harradon in developing and refining the Bia database." Id. at 2. Red Wolf provided examples of relevant messages from the April 2022 and July 2022 Productions. See id. at 2-4. For example, one message from Moeller to Harradon, that was produced for the first time in July 2022, stated: "We are going to work on some tools to help Chris more quickly assess the grid. It would be helpful for me if I knew things you might find useful." Id. at 3. Defendants filed a sur-reply and supporting affidavit concerning the Second Motion for Sanctions. See Dkt. No. 270.

In addition, as ordered, the parties filed memoranda addressing how damages should be determined if the court grants the Second Motion for Sanctions and orders defendants Bia and Moeller defaulted. See Dkt. Nos. 271, 272. Red Wolf argued that a

jury trial would not be required concerning its claims for damages or any other issue concerning Moeller and Bia. See Dkt. No. 272 at 1. Defendants did not claim that a jury trial would be required. See Dkt. No. 271.

A hearing concerning the Second Motion for Sanctions was held on August 10, 2022.⁵ During the hearing, Red Wolf's counsel expressed concern that Red Wolf still did not have everything that should have been produced. Red Wolf requested that the court order defendants to provide the 2019 Slack Archive to Red Wolf to be searched by Red Wolf's vendor and compared with the documents defendants had produced. See id. at 73-74. Defendants' counsel agreed with this request to the extent that "the purpose [of the search] would be to identify which are the messages that we now

⁵ At the August 10, 2022 hearing, the court questioned whether defendants' counsel Todd & Weld could, consistent with its obligations under Massachusetts Rules of Professional Conduct 1.7, 1.8, and 1.13, continue to represent all five of the defendants for settlement purposes. See Aug. 10, 2022 Tr. at 3-15. The court noted that Jon Moeller, Harradon, and GrowthWorks may have interests concerning settlement that conflict with the interests of Bia and Moeller. See id. at 4-7. Red Wolf represented that it wanted discuss settlement with Jon Moeller, Harradon, and GrowthWorks separately. See id. at 6. Therefore, the court ordered defendants' counsel to consider the relevant Massachusetts Rules of Professional Conduct and report whether they believed they could properly continue to represent all defendants. See id. at 14; Aug. 11, 2022 Order (Dkt. No. 284) at 1. On August 15, 2022, defendants' counsel reported that they had "determined that they cannot represent Michael Harradon or Jon Moeller for settlement purposes" and had advised them to retain independent counsel for any settlement discussions. See Dkt. No. 287. Harradon and Jon Moeller have recently done so. See Dkt. Nos. 314, 316.

have in 2022 that we should have had in 2019." See id. at 82.⁶

The court ordered defendants to provide Red Wolf with a copy of the 2019 Slack Archive to be searched by Red Wolf's litigation data vendor at, as Red Wolf offered, Red Wolf's expense. See Aug. 11, 2022 Order (Dkt. No. 284) at 1. The court ordered the search to include: (a) a search of the entire 2019 Slack Archive for the Search Terms; and (b) a search of all Slack communications between Christopher Jylkka and Moeller, Harradon, Jon Moeller, Brown, or Brian Voorheis from January 1, 2015 to January 31, 2019. See id. at 1-2. Red Wolf was ordered to report how many Slack messages containing Search Terms were discovered as a result of the search that had not been previously produced to Red Wolf in: (a) July 2022; (b) April 2022; and (c) 2019. See id. at 2. In addition, the parties were ordered to file supplemental memoranda concerning the prejudicial effect, if any, of the delayed disclosure of Slack messages containing Search Terms that should have been produced in 2019 or, with regard to Jylkka, additional Slack messages that should have been produced in April 2022. See id. at 3.

Largely because of the pending discovery dispute, trial could

⁶ Defendants' counsel also stated that defendants had previously offered the 2019 Slack Archive to Red Wolf, but "[t]hey rejected it at that time because they didn't want Greg Moeller to have inserted himself in the chain of custody." See id.; see also id. at 126 (Red Wolf's counsel stating "[W]hat we want is the 2019 archive. Granted, Mr. Moeller is part of custody. We can't change that part.").

not begin as scheduled on August 11, 2022. Nor could trial start soon after August 11, 2022. As the court explained, it was scheduled to have hearings on a motion to suppress evidence in a criminal case in which a college student died of a drug overdose beginning on August 17, 2022, followed the next week by proceedings in a criminal fraud case with 18 defendants. See Aug. 10, 2022 Tr. at 68.

On August 16, 2022, Red Wolf reported that on August 11, 2022, the day after the hearing on the Second Motion for Sanctions, defendants provided Red Wolf with an additional five messages containing a Search Term that had not been previously produced. See Dkt. No. 290 at 2. Red Wolf also reported that its litigation data vendor, UnitedLex, conducted a search on the 2019 Slack Archive ("the August 2022 Search"). See id.

On August 19, 2022, Red Wolf reported that the August 2022 Search revealed that "[i]n total, Bia failed to produce at least 128 relevant messages that contained a search 'hit.'" Slack Report (Dkt. No. 298) at 2. More specifically, Red Wolf asserts that:

I. 49 messages containing a search term and missing a user profile⁷ were never produced.

II. 68 messages containing a search term and missing a

⁷ A "user profile" identifies the sender of a message. Defendants claim that an error in Abramyan's program which resulted in the omission of relevant messages was caused by the program's failure to capture any Slack messages that were missing a "user profile" field. See Def. Opp. Second Mot. Sanctions (Dkt. No. 208) at 10; Abramyan Aff. at 8-9.

user profile were produced for the first time in the April 2022 production.

III. 26 messages containing a search term and missing a user profile were produced by Jylkka to Bia in 2019. . . . Bia did not produce . . . these 26 messages . . . in 2019.

IV. 5 messages containing a search term were produced to Red Wolf by [defendants'] counsel on July 23, 2022.

V. 6 messages containing a search term were produced to Red Wolf on August 11, 2022.

Id. at 3.

Moreover, Red Wolf argues that "[a]mong many other messages that should have been produced, [is] a proverbial 'smoking gun' from January 22, 2019 ([] mere days after Red Wolf's suit was filed) in which Defendants Greg Moeller and Michael Harradon discuss creating a new algorithm to hide the fact that the original algorithm was derived from Red Wolf intellectual property." Id. at 4. In those messages, Moeller asked Harradon: "[w]ould it be possible for you to create another algorithm from scratch? We are trying to come up with ways to make this go away. . . . we would need to be able to convince an outside observer that it was from scratch. not really sure what this would mean..." Id. Harradon responds, "If that means not derivative from IP then I think so..." Id.

In addition, Red Wolf filed an affidavit from Derek Duarte, the Senior Vice President of UnitedLex, which conducted the search of the 2019 Slack Archive. See Duarte Aff. (Dkt. No. 292). Duarte

stated that, in 2019, defendants could have used "a standard eDiscovery processing tool" to search and produce Slack messages for a cost of about \$10,000. Id. at ¶¶6-7. Duarte also stated that, in 2019, Slack had "a built-in search function that would allow a user to search channels and direct message conversations for certain search terms." Id. at ¶8. This function would not necessarily have enabled a user to export search results, but would have allowed a user "to verify the accuracy of any production related to those search terms." Id. at ¶9.

Duarte also stated that defendants' 2019 search of its Slack messages, as described by Abramyan in his affidavit, see Abramyan Aff. (Dkt. No. 208-1), "was outside of universally accepted standards and best practices for legally defensible data collection, preservation and production" and "not technologically sound[.]" Id. at ¶17. In his view, the search should have identified 24-hour threads to provide context for hits on Search Terms and that would have resulted in identification of all the "missed messages." Id.

In addition, Duarte stated that "[t]he conclusion we can infer or draw from the programmer's flawed process is that it may have been done deliberately in order to withhold potentially relevant data during discovery." Id. at ¶20. Duarte provided additional information that suggests that some Slack messages may have been deliberately withheld. He found an "anomaly" -- 87 empty folders

in the 2019 Slack Archive -- which, he stated, "supports an inference that deletion of channel data occurred after export from Slack but prior to transfer to Red Wolf." Id. at ¶22. Slack customer support confirmed for defendants that a "folder," meaning a channel, could be empty because a message was deleted. See Ex. A, Aug. 29, 2022 Moeller Affidavit (Dkt. No. 311-12) at 3.

On August 18, 2022, defendants submitted an affidavit from Jason Amis, Senior Director of Digital Forensics & Expert Services for Consilio, LLC, a litigation data vendor. See Amis Aff. (Dkt. No. 297). Amis stated that from 2017 to 2022, Consilio could not search and produce Slack data itself, but instead hired third-party vendors to do so. See id. Amis also stated that "there were no industry standards in 2019 for production of Slack data." Id. at ¶30.

In addition, Amis stated that "[w]hile Slack does have a search functionality, it does not produce reliable results in my experience." Id. at ¶17. However, "[i]n cases where Consilio is engaged, it is typically recommended that search terms be run against Slack material after it has been preserved, collected, parsed, formatted, and loaded into an e-discovery review platform." Id. at ¶19.

On August 24, 2022, Red Wolf submitted a supplemental memorandum concerning the prejudicial effect of the delayed disclosure of Slack messages. See Dkt. No. 304, under seal. Red

Wolf argues that "Bia's new or 2022 belatedly produced Slacks show that: (1) contrary to his earlier affidavit, Harradon relied on Jylkka's help in developing the [Bia] algorithm; (2) Bia use of Red Wolf's confidential and proprietary systems and software was pervasive; and (3) Moeller and Harradon conspired to cover up their wrongdoing after Red Wolf brought this lawsuit." Id. at 7. On August 29, 2022, Red Wolf supplemented this report with additional information about when Red Wolf first received the messages it now identifies as prejudicial. See Dkt. No. 310.

On August 29, 2022, defendants responded to Red Wolf's memorandum concerning the prejudicial effect of the delayed disclosure of Slack messages. See Dkt. No. 311. Defendants assert that Red Wolf "manufactured additional search term 'hits' by expanding the searches beyond what Plaintiff sought in search terms c-m, beyond what Bia did (as disclosed long ago) and beyond what the Court ordered on August 11, 2022." Id. at 12. Defendants also argue that "the Slack messages plaintiff identified as prejudicial and that were actually contemplated by the court's [August 11, 2022] order are not new in whole or substance[,] because similar messages were produced in 2019. Id.

Defendants also deny that data may have been deleted from the 2019 Slack Archive before it was provided to Red Wolf. See id. at 18-19. More specifically, Moeller provided an affidavit stating that he did not delete any files from the 2019 Slack Archive, as

well as transcript of an August 29, 2022 chat with Slack customer support that suggests the empty Slack channels could have been caused by a Slack participant starting a message without sending it. See Dkt. No. 311-12. However, as indicated earlier, Slack customer support also stated that the channel could be empty because of deletion of data. See id.

IV. ANALYSIS

A. Discovery Obligations

A party's duty to produce documents, among other things, is defined by Federal Rule of Criminal Procedure 26, the jurisprudence interpreting it, and court orders. Under Rule 26(b)(1), a plaintiff may obtain discovery of any non-privileged matter that is relevant to its claim and proportional to the needs of the case.⁸ The scope of discovery is broad, and includes information reasonably calculated to lead to admissible evidence. See Remexcel Managerial Consultants, Inc. v. Arlequin, 583 F.3d 45, 52 (1st Cir. 2009).

As indicated earlier, Rule 26(e)(1) requires a party to supplement or correct a response to a discovery request:

(A) in a timely manner if the party learns that in some material respect the disclosure or response is incomplete or incorrect, and if the additional or corrective information has not otherwise been made known to the other parties during the discovery process or in writing; or

⁸ Defendants do not claim that any of the documents the court ordered them to produce were withheld because they were not proportional to the needs of the case.

(B) as ordered by the court.

"[T]here is some authority for the proposition that Rule 26(e) requires a party to turn over not only responsive documents of which it is actually aware, but also documents of which it reasonably should be aware." Bartlett v. Mut. Pharm. Co., No. CIV.A. 08-CV-358-JL, 2009 WL 3614987, at *4 (D.N.H. Nov. 2, 2009); see also Arthur v. Atkinson Freight Lines Corp., 164 F.R.D. 19, 20 (S.D.N.Y. 1995) ("[T]he federal discovery rules place a duty on a party to turn over not only proper materials of which he is aware, but also those of which he reasonably ought to have been aware."); but see Zubulake v. UBS Warburg LLC, 229 F.R.D. 422, 433 (S.D.N.Y. 2004) (requiring "actual knowledge") (quoting Fed. R. Civ. P. 26(e), Advisory Committee Notes (1970)).

Even assuming without finding that the defendants⁹ in this case would not always have had an obligation to search for additional documents to be produced when questions were reasonably raised concerning the adequacy of a prior search, Rule 26(e)(1)(B) authorizes the court to order such a search. Any failure to make a serious, good faith effort to make complete production of required documents in response to a court order is unjustified. For example, in Rodowicz v. Massachusetts Mutual Life Insurance

⁹ For purposes of this section, "defendants" refers to Bia and Moeller.

Co., the First Circuit found a party had no substantial justification for failing to supplement discovery pursuant to Rule 26(e) in part because "[t]he trial judge requested that the parties verify the accuracy of their discovery evidence prior to trial." 279 F.3d 36, 45 (1st Cir. 2002). As explained earlier and discussed below, despite being ordered to review their prior document productions, and produce, among other thing, all relevant Slack messages, Bia and Moeller did not do so.¹⁰

B. The Misappropriation of Trade Secrets and Unfair Trade Practices Claims

Jylkka signed an employment agreement acknowledging that he was being given access to Red Wolf's trade secrets and confidential information. See Employment Agmt. at 6. He also agreed not to use or disclose Red Wolf's confidential information except in connection with Red Wolf activities. See id. In addition, Jylkka agreed not to consult with or act on behalf of any business that

¹⁰ Rule 26 also imposes a duty on the attorneys who submit a party's response a discovery request. Rule 26(g)(1) states that "every disclosure under Rule 26(a)(1) or (a)(3) and every discovery request, response, or objection must be signed by at least one attorney of record." "By signing, an attorney . . . certifies that to the best of the person's knowledge, information, and belief formed after a reasonable inquiry . . . with respect to a disclosure, it is complete and correct as of the time it is made." Id. The 1983 Advisory Committee Notes to Rule 26(g) explains that "[t]he duty to make a 'reasonable inquiry' is . . . an objective standard similar to the one imposed by Rule 11." See also Phinney v. Paulshock, 181 F.R.D. 185, 203 (D.N.H. 1998), aff'd sub nom. Phinney v. Wentworth Douglas Hosp., 199 F.3d 1 (1st Cir. 1999).

competes with Red Wolf. See Complaint at ¶45; Employment Agmt. at 7. If, as appears very likely, Jylkka was provided with Red Wolf's confidential information and trade secrets, disclosed them to Bia, and/or used them to assist Bia, his actions would violate the DTSA. See 18 U.S.C. §1839(5)(B). In addition, if, as also appears likely, Bia, Moeller, and Harradon knew that Jylkka was using Red Wolf's trade secrets to assist them in developing Bia's competing business, they too would have violated the DTSA. See id.; see also Allscripts Healthcare, LLC v. DR/Decision Res., LLC, 386 F. Supp. 3d 89, 94 (D. Mass. 2019).

With regard to Mass. Gen. Laws ch. 93A, a practice is unfair:

'if it is (1) within the penumbra of a common law, statutory, or other established concept of unfairness; (2) immoral, unethical, oppressive, or unscrupulous; or (3) causes substantial injury to [consumers,] competitors or other business people.' Heller Fin. v. Ins. Co. of N. Am., 410 Mass. 400, 573 N.E.2d 8, 12-13 (1991). Under this rubric, the legality of the challenged act or practice is not dispositive of its unfairness. See Mechs. Nat'l Bank of Worcester v. Killeen, 377 Mass. 100, 384 N.E.2d 1231, 1237 (1979).

Tomasella v. Nestle USA, Inc., 962 F.3d 60, 79 (1st Cir. 2020).¹¹

¹¹ Red Wolf also brings state law claims for unjust enrichment and conversion.

To succeed on a claim for unjust enrichment, a plaintiff must prove the following: "(1) a benefit conferred upon the defendant by the plaintiff; (2) an appreciation or knowledge by the defendant of the benefit; and (3) acceptance or retention by the defendant of the benefit under the circumstances would be inequitable without payment for its value." Tomasella, 962 F.3d at 82 (quoting Massachusetts Eye & Ear Infirmary v. QLT Phototherapeutics, Inc., 552 F.3d 47, 57 (1st Cir. 2009)). "Massachusetts courts emphasize

Among other things, the knowing use of Red Wolf's confidential information and/or trade secrets by defendants would violate Mass. Gen. Laws ch. 93A.

In view of the foregoing, defendants were required to produce all documents relevant to Red Wolf's DTSA and/or Mass. Gen. Laws ch. 93A claims if they were requested and the request was not subsequently narrowed by agreement. Defendants were also required to review their initial responses and supplement them if requested documents were not initially produced, as the court twice ordered and as Moeller in two affidavits claimed to have done. As explained earlier and discussed below, Moeller's representations were not true.

C. Default Judgment is Justified and the Most Appropriate Sanction for Bia and Moeller's Repeated Violations of Discovery Orders

District courts have broad authority to issue sanctions in response to a party's failure to obey discovery orders. Robson v. Hallenbeck, 81 F.3d 1, 2 (1st Cir. 1996); Fed. R. Civ. P. 16(f), 37(b)(2)(A). Under Federal Rule of Civil Procedure 37(b)(2),

the primacy of equitable concerns in a finding of unjust enrichment" Mass. Eye & Ear Infirmary, 552 F.3d at 57 (citing Salamon v. Terra, 394 Mass. 857, 477 N.E.2d 1029, 1031 (Mass. 1985)).

"The tort of conversion requires an intentional or wrongful exercise of dominion or control over personal property of another by one with no right to immediate possession." Kelley v. LaForce, 288 F.3d 1, 11 (1st Cir. 2002) (citing Third Nat'l Bank v. Continental Ins. Co., 388 Mass. 240, 446 N.E.2d 380, 383 (Mass. 1983); Restatement (Second) of Torts §222A (1965)).

sanctions must be both "just" and "specifically related to the particular 'claim' which was at issue in the order to provide discovery." Ins. Corp. of Ireland v. Compagnie des Bauxites de Guinee, 456 U.S. 694, 707 (1982). Sanctions are proper both to punish an offender and to deter others from engaging in comparable misconduct. See AngioDynamics, Inc. v. Biolitec AG, 780 F.3d 429, 435 (1st Cir. 2015); Companion Health Servs., Inc. v. Kurtz, 675 F.3d 75, 84 (1st Cir. 2012); Nat'l Hockey League v. Metro. Hockey Club, Inc., 427 U.S. 639, 643 (1976).

There are no mechanical rules for determining whether sanctions should be imposed and, if so, which are appropriate. See Robson, 81 F.3d at 2. Therefore, it is necessary to consider the totality of the circumstances, focusing on factors including, but not limited to, "the severity of the discovery violations, legitimacy of the party's excuse for failing to comply, repetition of violations, deliberateness of the misconduct, mitigating excuses, prejudice to the other party and to the operations of the court, and adequacy of lesser sanctions." AngioDynamics, Inc., 780 F.3d at 435; see also Vallejo v. Santini-Padilla, 607 F.3d 1, 8 (1st Cir. 2010); Robson, 81 F.3d at 2.

The First Circuit has stated that "a party's disregard of a court order is a paradigmatic example of extreme misconduct." Torres-Vargas v. Pereira, 431 F.3d 389, 393 (1st Cir. 2005). Violations of court orders are more severe if a party has flouted

the court's prior warning(s) and less severe if there was no prior warning. Robson, 81 F.3d at 3.

Counsel should be given an opportunity to explain the violation or seek a lesser penalty. The court should consider the explanation in determining which, if any, sanctions are appropriate. Id. -

Because "federal law favors the disposition of cases on the merits," default judgment is generally disfavored and is considered a "drastic" sanction to be used only in "extreme" situations. Stewart v. Astrue, 552 F.3d 26, 28 (1st Cir. 2009) (quoting Affanato v. Merrill Bros., 547 F.2d 138, 140 (1st Cir. 1977)); Hooper-Haas v. Ziegler Holdings, LLC, 690 F.3d 34, 37-38 (1st Cir. 2012). Cf. Torres-Vargas, 431 F.3d at 393 (describing sanctions of dismissal as "measures of last resort"). Such severe sanctions are typically warranted only if there are multiple instances of misconduct. See Companion Health Servs., Inc., 675 F.3d at 85; Hooper-Haas, 690 F.3d at 38 (noting default may be appropriate for "a persistently noncompliant litigant"). However, a court may impose a sanction of default without exhausting lesser sanctions if the relevant court orders are clear and the party has been properly warned of the risk of sanctions. Cf. Torres-Vargas, 431 F.3d at 393 (describing sanctions of dismissal); HMG Prop. Invs., Inc. v. Parque Indus. Rio Canas, Inc., 847 F.2d 908, 918 (1st Cir. 1988) (same). See also S. New Eng. Tel. Co. v. Glob.

NAPs Inc., 624 F.3d 123, 148 (2d Cir. 2010) ("[D]istrict courts are not required to exhaust possible lesser sanctions before imposing dismissal or default if such a sanction is appropriate on the overall record.").

Rule 37(b)(2)(vi) provides, and puts parties on notice, that a default judgment may be entered against them if they disobey discovery orders. See Robson, 81 F.3d at 4. In this case, despite repeated orders to review, and supplement if necessary, their production of documents, and repeated warnings that severe sanctions could be imposed if they failed to do so, Bia and Moeller violated the April 1, 2021 and August 31, 2021 discovery orders.

As explained below, these violations were serious. They resulted from what was at least Bia's and Moeller's reckless disregard of their obligations to produce documents and obey court orders. With regard to some Slack messages, there is reason to be concerned that the misconduct may have been deliberate. In any event, defendants' shifting explanations for their misconduct are neither legitimate nor persuasive.

Red Wolf has been seriously prejudiced by defendants' misconduct. That misconduct has also seriously injured the court's ability to manage this case and others on its docket. As a practical matter, entering default judgments against Bia and Moeller is the only viable Rule 37(b)(2) sanction. In any event, as explained below, default judgments are justified and the Rule

37(b)(2) sanction most appropriate to do justice in this case and to send a message to other litigants that it is perilous to repeatedly disobey court orders.

More specifically, on April 1, 2021, after granting the First Motion to Compel, the court ordered defendants to, among other things, "review the [G]oogle [S]uite documents and documents in the possession of defendant Michael Harradon which they have already produced and supplement them, and any other responses to requests for discovery, to the extent, if any, necessary under Rule 26(e) . . . [and] file an affidavit addressing its compliance with this Order and obligations under Rule 26(e)." Dkt. No. 112 (emphasis added).

On April 14, 2021, Moeller filed a sworn affidavit asserting that all five defendants had "compl[ie]d with the April Order and our obligations to supplement discovery under Rule 26(e)." Apr. 2021 Moeller Aff. at ¶18. This assertion proved to be untrue. Among other things, defendants had not produced the PowerPoint in Google Suites' Google Vault that is significant evidence that Jylkka used Red Wolf's proprietary software to assist Moeller and Harradon in developing Bia's evolving trading algorithm and, therefore, meaningful evidence that Jylkka, Moeller, and Bia misappropriated Red Wolf's trade secrets and engaged in deceptive trade practices. In addition, despite the court's order to supplement any other responses to requests for discovery, defendants did not in April

2021 produce numerous Slack messages that contained Search Terms which defendants were obligated to produce in 2019 in responding to Red Wolf's requests, and in 2021 pursuant to the court's orders.

Believing that they had all of the documents necessary to prepare properly, Red Wolf conducted depositions of the defendants in May 2021. Those depositions raised questions concerning whether defendants had produced all relevant Slack communications.

This issue was addressed at the August 26, 2021 hearing. The court again ordered defendants to "supplement their document production to the extent, if any, necessary under Federal Rule of Civil Procedure 26(e) and file an affidavit addressing their compliance with this Order and obligations under Rule 26(e)." Aug. 31, 2021 Order (Dkt. No. 140) at ¶1. On September 7, 2021, Moeller filed another sworn affidavit. See Sept. 2021 Moeller Aff. Relying on whatever additional search was done in response to the April 1, 2021 Order, if any, Moeller asserted that no further supplementation of the prior production of documents was required under Rule 26(e). See id. at ¶¶4-5.

Again, the representation that no supplementation was required was untrue. Defendants still had not produced the PowerPoint presentation and 46 other documents in Google Suite's Google Vault, or numerous Slack messages containing Search Terms. Therefore, the defendants also violated the August 31, 2021 Order.

As noted earlier, the First Circuit has stated that "a party's disregard of a court order is a paradigmatic example of extreme misconduct." Torres-Vargas, 431 F.3d at 39. The First Circuit has also emphasized that "disregard of a prior warning from the court exacerbates the offense." Robson, 81 F.3d at 2. Repeated violations of court orders following increasingly strong warnings is alone enough to justify default judgment as a sanction. For example, in Remexcel Managerial Consultants, Inc., the First Circuit affirmed the entry of default judgment when the district court "issued four warnings over the course of the litigation specifically directed at defendants' failures to respond to discovery requests" and had "previously issued milder sanctions for defendants' 'vexatious' behavior." 583 F.3d at 52. The First Circuit explained that "the district court did not abuse its discretion by entering a default judgment in response to defendants' repeated failures to respond to discovery" in part because "[t]he court's choice of sanctions as well as the sternness of its warnings gradually escalated over the course of the litigation in response to defendants' persistently troublesome conduct." Id.

This case is comparable to Remexcel. Here, the court issued escalating warnings to defendants concerning the consequences of violating their discovery obligations and ordered milder relief related to defendants' initial discovery violations. As explained

earlier, at the March 31, 2021 hearing concerning Red Wolf's First Motion to Compel, the court stated:

[Defendants] have that duty to supplement under Rule 26, and you should look.

* * *

I'm inclined to give [defendants] the same 2 weeks to see whether there's more they should have produced. . . . If it turns out they didn't produce everything, we've got issues about why not and sanctions. That's what I'd like to avoid.

* * *

I want [defendants] to take this period and see whether [there are] any responses that [they] need to supplement because, inadvertently, this wasn't disclosed before. That should give the plaintiff everything to use at the depositions and avert discovery disputes.

Mar. 31, 2021 Tr. at 44-45, 47 (emphasis added). Therefore, the court ordered defendants to "review" the discovery that had been produced "carefully" in order to determine whether the prior productions of documents were incomplete. Id. at 56, 57.

The next day, the court issued a written Order directing defendants to, among other things, "review the google suite documents and . . . any other responses to requests for discovery [an produce] to the extent, if any, necessary under Rule 26(e)" any additional documents. Apr. 1, 2021 Order (Dkt. No. 112) at 1-2 (emphasis added). Subsequently, Moeller filed an affidavit claiming to have complied with the April 1, 2021 Order. See Apr. 2021 Moeller Aff.. This representation proved to be untrue as

additional documents that should have previously produced were repeatedly discovered.

After Red Wolf deposed the defendants, it contended that not all relevant, requested Slack communications had been produced. See Dkt. No. 135 at 2. At the August 26, 2021 hearing, the court again ordered defendants to supplement the production of documents if necessary, see Aug. 26, 2021 Tr. at 10, and memorialized that direction in an August 31, 2021 Order, see Dkt. No. 140. Evidently, without doing any further review of defendants' production of documents, Moeller filed another affidavit claiming to have complied with the August 31, 2021 Order. This too proved to be untrue.

The violations of the April 1, 2021 and August 31, 2021 Orders, following the court's reference to possible sanctions and providing defendants two opportunities to cure deficiencies in their production of documents, led to another Red Wolf Motion to Compel and its First Motion for Sanctions. As explained earlier, defendants state that in preparing an expert for a deposition, they became aware of the PowerPoint presentation and 46 other requested documents in the Google Vault, a component of Google Suite. See Dkt. No. 161. As required by Rule 26(e), they provided those documents to Red Wolf. Red Wolf moved to sanction defendants for failing to comply with the April 1, 2021 Order that expressly required production of all Google Suite documents, and for

Moeller's untrue sworn assertion that had been done. In addition, Red Wolf moved to compel production of all required Slack communications.

At the March 22, 2022 hearing, the court found that defendants violated the April 1, 2021 Order by not producing 47 Google Suite documents. The court did not know about, and therefore did not consider, defendants' failing to produce required Slack messages containing Search Terms. Taking a restrained approach to the violation, the court found that it was not substantially justified and ordered defendants to pay Red Wolf's reasonable attorneys' fees and expenses relating to the request for sanctions. The court did not, however, exercise its discretion to impose sanctions, including default judgment, as authorized by Rule 37(b)(2). It is necessary and appropriate to reconsider and revise that decision now that more violations of the April 1, 2021 Order have been discovered.

On March 22, 2022, the court also granted Red Wolf's Motion to Compel the production of all Slack communications between Jylkka and defendants from January 1, 2015 to January 31, 2019, because Red Wolf rightly discerned that defendants had improperly limited the production to communications between them that contained Search Terms. The court stated that it reasonably could have found that the failure to produce was deliberate and in violation of its April 1, 2021 and August 31, 2021 Orders. See Mar. 22, 2022 Tr. at

67. However, it gave defendants the "the benefit of great doubt" and found that there was not a meeting of the minds between the parties on what was required to be produced. Id. Therefore, it did not require defendants to compensate Red Wolf for the expense of its meritorious Motion to Compel as it could have under Rule 37(c)(1).

Although reluctant to protract this then long-pending case, the court preferred to see it decided on a fully informed basis on the merits. Therefore, it authorized Red Wolf to take additional depositions of Moeller, Harradon and Brown. See Dkt. No. 182 at ¶4; Dkt. No. 189. In doing so, the court explained that:

I want to be clear about this. This case should be over by now and now it's getting reopened. It's getting reopened because documents like the PowerPoint that to me appear to be potentially important to the merits of the case weren't disclosed until after the end of the opportunity for depositions at least.

Id. at 57. The court also said: "I just don't want to get to the point where there are more documents. This has got to end." Mar. 22, 2022 Tr. at 45.

Similarly, with regard to the Slack messages, the court provided a stern warning to Moeller particularly that there could be severe consequences if more documents that should have been produced were discovered in the future, stating:

I don't want to get an answer from Mr. Moeller, well, we looked for all of this last year and we turned over what we found last year. Look again, because these are court orders. If they're violat[ed] and I find it's willful,

they can be punished by contempt. Then you're not talking about paying money. It can be criminal contempt if there's clear and convincing evidence that it's willful. Somebody can get locked up.

Id. at 42-43 (emphasis added).

The court also told the defendants that: "this is not a game of hide and seek. . . . I issue an order and you have to disclose it." Id. at 74.

Despite the court's increasingly stern warnings, defendants did not adequately "look again" and did not provide all of the required Slack messages before the re-opened depositions. After March 2022, defendants made three additional productions containing Slack messages with Search Terms that had not been previously produced. First, the April 2022 Production revealed that the 2019 Production had been incomplete. Red Wolf states that the April 2022 Production included 68 Slack messages containing Search Terms that had not been previously produced. This led to the Second Motion for Sanctions filed on June 8, 2022. Next, the July 2022 Production included an additional 22 Slack messages containing Search Terms that had not previously been produced. On August 11, 2022, after the Second Motion for Sanctions had been argued, defendants provided 6 additional Slack messages containing Search Terms that had never been produced. Finally, as a result of the August 2022 Search of the 2019 Slack Archive, which Red Wolf received and searched after August 11, 2022 when trial had been

scheduled to begin, Red Wolf states that it discovered an additional 49 Slack messages containing Search Terms that had never been produced.

Defendants seek to excuse their repeated failures to produce potentially important documents by blaming people they employed for purportedly inadvertent errors. First, they blame Brown for inexplicably not searching the entire Google Vault when he searched Google Suite which includes it, and for failing to produce 47 documents including the PowerPoint presentation. Second, they blame Abramyan for devising from scratch a flawed program to search Slack, which he had never done before. See Abramyan Aff. at ¶18.

Moeller has provided changing, unconvincing explanations for why Bia did not employ an experienced vendor to search the Slack messages. Initially, Moeller claimed that in 2019 "there was no ready mechanism to export the messages so they could be produced in litigation." Nov. 9, 2021 Moeller Aff. at ¶5. This was not true and there is reason to believe that Moeller knew it was not true. His attorney has stated that in 2019 she consulted a vendor who could have produced Slack messages in an Excel spreadsheet. See Aug. 10, 2022 Tr. at 92-93. Red Wolf's expert, who has eight years of experience as a litigation data vendor, states that in 2019 defendants could have used "a standard eDiscovery processing tool" to search and produce Slack messages for a cost of about \$10,000. Duarte Aff. at ¶¶6-7. Defendants' expert, with nine years of

experience as a litigation data vendor, did not refute this. Rather, he states that while his firm had not in 2019 developed its own tool to search Slack messages, it was then the firm's practice to engage third-party vendors to do that. See Amis Aff. at ¶16.

Moreover, both Amis and Duarte agree that, in 2019, Slack had a built-in search functionality that could be used to verify the accuracy of a Slack production based on search terms, although Amis states that the search function is not always reliable. See Amis Aff. at ¶¶17-19; Duarte Aff. at ¶¶8-9.

In his May 2022 deposition, Moeller testified that he consulted Brown, who had relevant expertise about how to search Slack, and Brown told Moeller that he was not aware of an existing way to do it. See Moeller Dep. Tr. (Dkt. No. 197-2) at 9, 15-16. However, Brown testified that he told Moeller that while he did not think Slack could be searched, he was not familiar with Slack and could not provide him reliable guidance concerning it. See Brown Dep. Tr. (Dkt. No. 197-8) at 31.

At his May 2022 deposition, Moeller also changed his explanation of why Bia had not hired an experienced vendor to search the Slack messages. He claimed that as a start-up company, Bia could not afford the expense. See Moeller Dep. Tr. (Dkt. No. 197-2) at 64, 189.

At a minimum, Moeller's decision to utilize an unpaid novice in Kazakhstan to conduct its search for Slack messages, rather than an experienced vendor in the United States at a modest cost, and defendants' repeated failures to produce all required documents, was in reckless disregard of his duties under Rule 26 and to obey court orders.

There is evidence that indicates that Bia and Moeller may have deliberately failed to produce some Slack messages. Red Wolf's expert identified an "anomaly" in the 2019 Slack Archive. Duarte Aff. at ¶22. It includes 87 Slack "channels" that contain no "data," meaning content. Id. In his opinion, this "supports an inference that deletion of channel data occurred after export from Slack but prior to transfer to Red Wolf." Id. In addition, Slack Customer Support has stated that a "folder," meaning a channel, could be empty because a message was deleted. See Dkt. No. 311-12 at 3.

Any deliberate deletion of messages would be an especially serious form of misconduct. However, litigating whether that occurred would be time-consuming for the court and expensive for Red Wolf. Whether defendants repeated failure to produce documents in violation of court orders and stern warnings was deliberate or reckless, or possibly in part both, is not material to the court's conclusion that as of the time that the Second Motion for Sanctions seeking default judgments was filed on June 8, 2022, defendants'

misconduct was extreme. See Torres-Vargas, 431 F.3d at 393; Robson, 81 F.3d at 3.

That misconduct was also prejudicial. The First Circuit has stated that "[r]epeated disobedience of a scheduling order is inherently prejudicial because disruption of the court's schedule and the preparation of other parties nearly always results." Robson, 81 F.3d at 4. This is equally true with regard to defendants' disobedience of the two orders concerning discovery in this case.

That misconduct significantly prejudiced Red Wolf. There are now belatedly produced documents about which Red Wolf could not question defendants during the reopened depositions in May 2022. The fact that additional documents were produced by defendants in July 2022 and in August 2022 suggests that there may be even more missing documents. It would be expensive to order that defendants and possibly others be deposed a third time. As *Bia* most recently pled poverty as an excuse for not hiring an experienced vendor to search the Slack messages, defendants may not be able to pay even the reasonable attorneys' fees and expenses to date relating to the Second Motion for Sanctions that the court is ordering pursuant to Rule 37(c).

Reopening the depositions again would also further delay a resolution of this case on the merits and thus prejudice Red Wolf. It appears likely that Red Wolf is suffering competitive injury

during the pendency of this case. Although the court denied the January 2019 motion for a preliminary injunction based on the limited information available, including Moeller and Harradon's affidavits claiming that information that Jylkka provided them while employed by Red Wolf did not assist in the development of Bia's trading algorithm in any way, documents subsequently produced indicate that is not true. Rather, it appears likely that Red Wolf would be able to prove at trial that Jylkka, Bia, Moeller, and Harradon, at least, misappropriated Red Wolf's trade secrets and violated Mass. Gen. Laws ch. 93A as well. Defendants' failure to produce documents required by the Federal Rules of Civil Procedure and the court's orders deprived Red Wolf of the opportunity to file a fully informed motion for summary judgment that may have been meritorious and ended this case long ago.

In any event, the defendants' misconduct has compelled a postponement of the trial that was scheduled for August 11, 2022. By engaging in misconduct that has delayed resolution of this case, defendants have prolonged their opportunity to profit from the misappropriation of Red Wolf's trade secrets and other unfair practices that Red Wolf alleges and appears likely to be able to prove.

Defendants' misconduct has also severely injured the court's ability to manage this case and the many other cases on its docket. As the court repeatedly stated in 2021, it has never in more than

37 years had a civil case with more discovery disputes and motions for sanctions than this one. At the August 10, 2022 hearing, the court informed the parties that it had allocated seven days to conduct the trial scheduled to begin on August 11, 2022, which would be followed by a hearing on a motion to suppress evidence in a criminal case involving the death of a student from a drug overdose beginning on August 17, 2022. See Aug. 10, 2022 Tr. at 68. The court conducted that suppression hearing, but the need to issue this decision on the Second Motion for Sanctions is delaying the completion of its decision in that consequential case. It is also consuming judicial time that could and should be devoted to many other cases deserving attention.

The totality of the circumstances as of June 8, 2022 both when the Second Motion for Sanctions was filed, and as they existed in August 2022 before the 2019 Slack Archive was searched, persuade the court that, pursuant to Rule 37(b)(2)(vi), a default judgment is justified and the most appropriate sanction for defendants' misconduct.

In summary, the defendants' repeated violations of their duty to produce documents are severe. Red Wolf was long deprived of documents that are evidence of the merit of its claim and could have led to the discovery of more such evidence. Defendants' violations of two discovery orders constitutes extreme misconduct. See Torres-Vargas, 431 F.3d at 393. That misconduct is exacerbated

because defendants continued their misconduct despite multiple, increasingly severe warnings that any further failure to supplement their incomplete production of documents would be severely sanctioned. See Robson, 81 F.3d at 3. Red Wolf has been prejudiced by defendants' persistent misconduct.

Default judgment is a sanction specifically related to the claims at issue in the orders to provide discovery. See Ins. Corp. of Ireland, 456 U.S. at 707. The documents that were not produced when required relate directly to Red Wolf's misappropriation of trade secrets and unfair trade practices claims. Defendants' excuses for their repeated misconduct are unconvincing. In view of the court's clear orders and repeated warnings, entering default judgments pursuant to Rule 37(b)(vi) would be permissible and appropriate even if the court had other options. See Torres-Vargas, 431 F.3d at 393; HMG Prop. Invs., Inc., 847 F.2d at 918; S. New Eng. Tel. Co., 624 F.3d at 148. There are, however, no other available appropriate sanctions. Directing that key disputed matters be taken as established in favor of Red Wolf, or precluding defendants' from offering evidence on those issues, would merely prolong litigation in which Red Wolf would inevitably prevail. See Fed. R. Civ. P. 37(b)(i), (ii). Staying proceedings until the court's discovery orders are fully obeyed and reopening the depositions of the defendants again would unduly prolong this case further, probably unfairly impose greater expense on Red Wolf, see

Fed. R. Civ. P. 37(b)(2)(A)(iv), and allow Bia to continue to try to profit from its likely misappropriation of trade secrets and unfair trade practices. Conducting civil and/or criminal proceedings to decide whether Moeller and Bia should be held in contempt for violating the court's two discovery orders would also prolong this case without providing any benefit to Red Wolf. See Fed. R. Civ. P. 37(b)(vii).

Therefore, on the record as it existed both on June 8, 2022, and before Red Wolf received and searched the 2019 Slack Archive, the court finds that the Second Motion for Sanctions is meritorious, entering default judgments against Bia and Moeller is justified, and doing so is the most appropriate remedy for their repeated extreme misconduct.

In this case, ordering default judgment as the sanction for defendants' repeated violations of court orders despite stern warnings that severe sanctions could be imposed if they were violated is also justified in order to deter others from emulating defendants' misconduct. See Nat'l Hockey League, 427 U.S. at 643; AngioDynamics, Inc., 780 F.3d at 435 (citing Companion Health Servs., Inc., 675 F.3d at 84). The law is not a game, and, as the court told defendants, civil discovery is not a game of hide and seek. See Mar. 22, 2022 Tr. at 74. The decision in this case should encourage litigants to understand that it is risky business to recklessly or deliberately fail to produce documents, and perilous

to disobey court orders to review and, if necessary, supplement prior productions. It is in the interests of the administration of justice to default Bia and Moeller to send those messages.

Although not material to the court's decision to default them, developments since the August 10, 2022 hearing reinforce the propriety of that decision. When Red Wolf received the 2019 Slack Archive after the August 10, 2022 hearing, and its vendor searched it using Search Terms, it found threads with previously unproduced relevant messages. Defendants now claim that they were not required to produce some of them because they were not within five messages of those that contained Search Terms and the disputed messages and, therefore, were not required to have been produced. See Dkt. No. 311 at 2, 9-10. However, Moeller had represented that defendants would produce "(a) all messages with search term hits, plus both (b) ten messages around that message (five prior and five after) and (c) the entire thread (if it was not already captured by the ten messages around the hit protocol)." Dkt. No. 157-3 at ¶10; see also Mar. 22, 2022 Tr. (defendants' attorney stated that "we produced context messages around the hits, five in front and five after, and if there were any replies to a hit, we produced those"). Defendants did not do what they represented they would do, and should have done in any event.

If Bia had produced what should have been produced, Red Wolf would have received in 2019 messages important to its claims of

improper collaboration between Jylkka and his codefendants in developing Bia's evolving trading algorithm, which was vital to its ability to compete with Red Wolf and others.

Those messages reveal that Harradon characterized information that Bia was receiving from Jylkka in 2018 concerning trading fees as "important," Ex. B, Slack Report (Dkt. No. 298-2) at 7. In addition, those messages show that Moeller and Harradon were pleased that Jylkka was risking Red Wolf's money when executing Bia's trade recommendations, with Moeller writing that "[w]hen [Jylkka] leaves, his firm is holding the bag. . . . That is why what he is doing now is so valuable[.]" Id. at 10.

In addition, on January 22, 2019, soon after this case began, Moeller asked Harradon if it would be possible for him "to create another algorithm from scratch" because "we would need to be able to convince an outside observer that it was from scratch[.]" Id. at 33. This message raises the question of whether Moeller and Harradon were attempting to cover-up evidence of the misappropriation of trade secrets and unfair trade practices with which Red Wolf had then recently claimed in this case. They deny this was their intent. See Dkt. No. 311 at 14. In any event, Red Wolf's search of the Slack archive in August 2022 led to the discovery of valuable evidence that it should have received in 2019, and about which it should have had opportunities to question defendants at their depositions.

D. Bia and Moeller Must Pay Red Wolf's Reasonable Attorneys' Fees and Expenses Concerning the Second Motion for Sanctions

Federal Rule of Civil Procedure 37(c)(2)(C) states that "[i]nstead of or in addition to [sanctions imposed pursuant to Rule 37(2)(b)], the court must order the disobedient party, the attorney advising that party, or both to pay the reasonable expenses, including attorney's fees, caused by the failure [to produce documents], unless the failure was substantially justified or other circumstances make an award of expenses unjust."

The court previously found that defendants violated the April 1, 2021 Order by not producing the 47 Google Vault documents in response to it and claiming no supplementation was required, and found that failure was not substantially justified. See March 23, 2022 Order (Dkt. No. 182) at ¶13. Therefore, the court ordered defendants to pay the reasonable attorneys' fees and expenses incurred by Red Wolf in making the motion, and required their attorneys, Todd & Weld, to make up any difference if defendants could not pay the full amount. Id.¹²

The court has considered defendants' explanations for their violations. For the reasons explained concerning the finding that Moeller and Bia should be defaulted as a sanction for violating the April 1, 2021 and August 31, 2021 Orders, their failures to

¹² The March 23, 2022 Order stated that the award was made pursuant to Rule 37(a)(5). It should have referenced instead Rule 37(b)(2)(c), which relates to violations of discovery orders.

produce were not substantially justified and there are no other circumstances that make an award of reasonable attorneys' fees unjust. Therefore, defendants are being ordered to pay Red Wolf's reasonable expenses, including attorneys' fees, concerning the Second Motion for Sanctions.

It is not certain whether defendants, who are at least primarily responsible for the violations, will be able to pay the full amount that will be awarded. If they cannot or do not, the court will give defendants' counsel an opportunity to be heard concerning whether they should be ordered to make up any deficiency. See Fed. R. Civ. P. 37(b)(2)(C) (authorizing the court to order the attorney advising the disobedient party to pay reasonable expenses, including attorneys' fees, caused by the failure to obey a discovery order).

E. Harradon and Jon Moeller

As explained earlier, at the August 10, 2022 hearing, the court informed defendants' counsel of provisions of the Massachusetts Rules of Professional Conduct that raised questions concerning whether Todd & Weld could properly continue to represent Harradon, Jon Moeller, and GrowthWorks, because their interest concerning settlement appeared different from the interests of Bia and Moeller. See Aug. 10, 2022 Tr. at 3-15. Todd & Weld decided that it could not continue to represent Harradon and Jon Moeller. See Dkt. No. 287.

Harradon and Jon Moeller now have new counsel. See Dkt. Nos. 313, 316. It was reported that each is now discussing settlement with Red Wolf, although discussions with Jon Moeller have so far been unsuccessful. See Dkt. No. 317. They are each being ordered to report, by September 26, 2022, whether they have agreed to settle with Red Wolf.

In addition, GrowthWorks, another company operated by Moeller, has been treated throughout this litigation as synonymous with Bia. In his 2019 affidavit, Moeller referred to Bia and Growthworks "interchangeably" and stated that "[w]hile in its nascent stages, I informally operated BCM prior to its formation under the GrowthWorks name." 2019 Moeller Aff. at ¶7. However, in the Second Motion for Sanctions, Red Wolf only moved for sanctions against Bia and Moeller. Therefore, the parties are being ordered to confer and, by September 26, 2022, report whether they have agreed to resolve this case as to GrowthWorks, and, if not, whether GrowthWorks should, like Bia, be defaulted or possibly dismissed from the case.

V. ORDER

In view of the foregoing, it is hereby ORDERED that:

1. Red Wolf's Second Motion for Sanctions (Dkt. No. 196) is ALLOWED.

2. Default shall issue on all counts against defendants Bia Capital Management, LLC and Gregory Moeller.

3. By September 26, 2022, Red Wolf, Bia, and Moeller shall confer and report, jointly if possible but separately if necessary, concerning:

(a) Whether they have reached an agreement to resolve this case.

(b) If not, what proceedings should be conducted to determine the amount of damages and possibly injunctive relief to be awarded to Red Wolf.

(c) The amount of reasonable attorneys' fees and expenses Red Wolf requests concerning the Second Motion for Sanctions and whether Bia and Moeller have agreed to pay them.

4. By September 26, 2022, Harradon and Jon Moeller shall each confer with Red Wolf, and the parties shall report whether agreements have been reached to settle the claims against either or both of them.

5. By September 26, 2022, GrowthWorks, LLC and Red Wolf shall confer and report whether an agreement has been reached to resolve the claims against it. If not, the parties shall report whether GrowthWorks as well as Bia and Moeller should be defaulted, or whether GrowthWorks should be dismissed from this case.


UNITED STATES DISTRICT JUDGE