DETAILED REPORT

March 2021 Coordinated Inauthentic Behavior Report

FACEBOOK

We're constantly working to find and stop coordinated campaigns that seek to manipulate public debate across our apps.

PURPOSE OF THIS REPORT

Over the past three and a half years, we've shared our findings about coordinated inauthentic behavior we detect and remove from our platforms. As part of our regular CIB reports, we're sharing information about all networks we take down over the course of a month to make it easier for people to see progress we're making in one place.

WHAT IS CIB?

We view CIB as coordinated efforts to manipulate public debate for a strategic goal where fake accounts are central to the operation. There are two tiers of these activities that we work to stop: 1) coordinated inauthentic behavior in the context of domestic, non-government campaigns and 2) coordinated inauthentic behavior on behalf of a foreign or government actor.

COORDINATED INAUTHENTIC BEHAVIOR (CIB)

When we find domestic, non-government campaigns that include groups of accounts and Pages seeking to mislead people about who they are and what they are doing while relying on fake accounts, we remove both inauthentic and authentic accounts, Pages and Groups directly involved in this activity.

FOREIGN OR GOVERNMENT INTERFERENCE (FGI)

If we find any instances of CIB conducted on behalf of a government entity or by a foreign actor, we apply the broadest enforcement measures including the removal of every on-platform property connected to the operation itself and the people and organizations behind it.

CONTINUOUS ENFORCEMENT

We monitor for efforts to re-establish a presence on Facebook by networks we previously removed. Using both automated and manual detection, we continuously remove accounts and Pages connected to networks we took down in the past.

SUMMARY OF MARCH 2021 FINDINGS

Our teams continue to focus on finding and removing deceptive campaigns around the world — whether they are foreign or domestic. In March, we removed 14 networks from 11 countries. Five networks — from Albania, Iran, Spain, Argentina and Egypt — targeted people primarily outside of their countries. Nine others — from Israel, Benin, Comoros, Georgia and Mexico — focused on domestic audiences in their respective countries. We've shared information about our findings with industry partners, researchers, law enforcement and policymakers.

Here are a few notable highlights:

Early detection and continuous enforcement: Most of the networks we removed in March had limited following or were in the early stages of building their audiences when we removed them. The small Iranian network is a good example: the threat actor behind it attempted to recreate their presence after we disrupted their operation targeting Israel in [October 2020](#). Late last year and in early 2021, they began creating Pages and accounts, some of which were detected and disabled by our automated systems. About a month after their first Page was created our teams began investigating the rest of the network. Ongoing enforcement against these threat actors across the internet has made these operations less effective in building their following. With each removal, we set back the actors behind these networks, forcing them to re-build their operations and slowing them down.

A deep dive into a troll farm: In addition to these newer networks, we also investigated and disrupted a long-running operation from Albania that targeted primarily Iran. While not successful in building significant audiences over several years of operation, this campaign was run by what appears to be a tightly organized troll farm linked to an exiled militant opposition group from Iran, Mojahedin-e Khalq (MEK). To shine light on how such operations manifest on our platform, we're adding a detailed research and analysis section at the end of this report. We've shared our findings with other platforms and researchers to contribute to additional discoveries into similar activity on the broader internet.

AI-generated images: In March, we removed three CIB networks that used profile photos likely generated using machine learning technologies capable of creating realistic images. Since 2019, we have now disrupted seven operations that used such synthetic photos. Notably, although the use of GAN-generated images can make an account look authentic to an external observer, it doesn't materially change the deceptive behavior patterns that we look for to identify inauthentic activity.

We know that influence operations will keep evolving in response to our enforcement, and new deceptive behaviors will emerge. We'll continue to refine our enforcement and share our findings publicly. We're making progress rooting out this abuse, but as we've said before — it's an ongoing effort. We're committed to continually improving to stay ahead. That means building better technology, hiring more people and working closely with law enforcement, security experts and other companies.

- Total number of Facebook accounts removed: 1,167

- Total number of Instagram accounts removed: 290

- Total number of Pages removed: 255

- Total number of Groups removed: 34

NEW NETWORKS REMOVED IN MARCH 2021:

1. **Albania**: We removed 128 accounts, 41 Pages, 21 Groups and 146 Instagram accounts from Albania that targeted global audiences including Iran. We found this network as part of our internal investigation and linked it to MEK, an exiled militant opposition group from Iran now based in Albania. (See a detailed analysis of this network's activity at the end of this report).

2. **Iran**: We removed 29 Facebook accounts, two Pages, one Group and 10 Instagram accounts from Iran that targeted Israel. We found this network as a result of our internal investigation into the suspected coordinated inauthentic behavior linked to the network we removed in October 2020.

3. **Spain and El Salvador**: We removed 118 Facebook accounts, eight Pages and ten Instagram accounts from Spain and El Salvador that targeted El Salvador. We found this network after reviewing research about some of this activity by FireEye, a cyber security company. Our investigation found links to Spain-based employees of the Italian PR firm Reputation Up and individuals with a background in digital marketing working on behalf of the ARENA party in El Salvador.

4. **Spain and Argentina**: We removed 390 Facebook accounts, six Pages and 17 Instagram accounts from Spain and Argentina that targeted Ecuador. We found this network after reviewing research about some of this activity on other platforms by FireEye, a cyber security company. Our investigation found links to Leanga Software, a social media management company in Spain.

5. **Egypt**: We removed 17 Facebook accounts, six Pages and three Instagram accounts from Egypt that targeted Ethiopia, Sudan and Turkey. We found this network as part of our internal investigation and linked it to Bee Interactive, a marketing firm in Egypt.

6. **Israel**: We removed 37 Facebook accounts, 20 Pages and one Instagram account from Israel that targeted domestic audiences in that country. We found this network as part of our internal investigation. Our assessment benefited from information shared with us by local civil society in Israel. Our investigation found links to ElBaladd, a news website in Israel.

7. **Benin**: We removed 21 Facebook accounts, 16 Pages and 9 Instagram accounts from Benin that targeted domestic audiences in that country. We found this network as part of our internal investigation into suspected coordinated inauthentic behavior in the region.

8. **Comoros**: We removed 33 Facebook accounts, 12 Pages and 5 Instagram accounts from Comoros that targeted domestic audiences in that country. We found this network as part of our internal investigation and linked it to Centre Médiatique Moderne des Comores (CMMC), a communications company in Comoros.

9. **Georgia**: We removed 23 Facebook accounts, 24 Pages, 12 Groups and 11 Instagram accounts from the country of Georgia that targeted domestic audiences in that country. We found this network after reviewing public reporting on this activity by researchers at the Digital Forensic Research Lab at the Atlantic Council. Our investigation found links to individuals associated with Georgian March, a political party in Georgia and its youth wing.

10. **Mexico**: We removed 71 Facebook accounts, 18 Pages and seven Instagram accounts from the state of Quintana Roo in Mexico that targeted domestic audiences in that state. We found this activity as part of our internal investigation into suspected coordinated inauthentic behavior in the region.

11. **Mexico**: We removed 56 Facebook accounts from the state of Colima in Mexico that targeted domestic audiences in that state. We found this activity as part of our internal investigation into suspected coordinated inauthentic behavior in the region.

12. **Mexico**: We removed 54 Facebook accounts and 73 Pages from the state of Baja California in Mexico that targeted audiences in that state. We found this activity as part of our internal investigation into suspected coordinated inauthentic behavior in the region.

13. **Mexico**: We removed 39 Facebook accounts, 15 Pages, and eight Instagram accounts that originated in Mexico and targeted domestic audiences. We found this activity as part of our internal investigation and linked it to Flow Agency, a PR firm in Mexico.

14. **Mexico**: We removed 151 Facebook accounts, 14 Pages and 63 Instagram accounts from the state of Nayarit in Mexico that targeted domestic audiences in that state. We found this activity as part of our internal investigation into suspected coordinated inauthentic behavior in the region.

01

See a detailed analysis of the activity by the Albania-based network at the end of this report, on page 43.

02

We removed 29 Facebook accounts, two Pages, one Group and 10 Instagram accounts for violating our policy against foreign interference which is coordinated inauthentic behavior on behalf of a foreign entity. This network originated in Iran and targeted Israel.

The people behind this network used fake accounts — some of which had already been detected and disabled by our automated systems — to post content and create fictitious personas posing as locals in Israel, including left-leaning activists. The people behind this activity posted in Hebrew and English primarily about the Black Flags protest movement and criticism of Prime Minister Netanyahu. Given the 2021 Israeli legislative election, once we completed our investigation, we moved quickly to take down this network in early March. It was early in its audience building and had nearly no following in Israel when we removed it.

We found this network as a result of our investigation into the suspected coordinated inauthentic behavior linked to the network we removed in October 2020.

- *Presence on Facebook and Instagram:* 29 Facebook accounts, 2 Pages, 1 Group and 10 accounts on Instagram.

- *Followers:* About 1,600 accounts followed one or more of these Pages, fewer than 10 people joined this Group and around 950 people followed one or more of these Instagram accounts.

Below is a sample of the content posted by some of these accounts and Pages.

Translation

Caption: #Anti-Netanyahu and #Pro-Israel #protest #kiryatyovel #Jerusalem #Demonstration #against #Netanyahu and for #Israel #Black Flags #kiryatyovel #Jerusalem

Translation

Caption: #Go #Go_Bibi #Coronavirus #Protest #Demonstration

Mar 8, 2021 4:50pm

בלעדי נתניהו מחסל את החברה הישראלית מספיק די! ביבי תתפטר יא# ▉ מושחת! מחאת הדגלים השחורים _מצילים את הדמוקרטיה @bbmovements🇮🇱

Translate

Translation

Caption: "Exclusive – Netanyahu is destroying Israeli society, enough is enough! Bibi resign, you are corrupt! The Black Flags protest, saving democracy"

03

We removed 118 Facebook accounts, eight Pages and ten Instagram accounts for violating our policy against [foreign interference](#) which is [coordinated inauthentic behavior](#) on behalf of a foreign entity. This network originated in Spain and El Salvador and targeted El Salvador.

We identified several clusters of activity that relied on fake accounts — some of which had already been automatically detected and disabled — to create fictitious personas, post, drive people to off-platform domains and manage Pages posing as independent news entities and civic groups. One cluster appeared to use fake and likely purchased accounts to post at high, spam-like rates to artificially boost this network's distribution. Some of the accounts posed as investigative journalists and some used photos likely generated using machine learning techniques like generative adversarial networks (GAN).

The people behind this activity posted in Spanish about news and politics in El Salvador, particularly focusing on the mayoral election in Santa Tecla. Their content included criticism of mayoral candidate Henry Flores and supportive commentary about his opponents. Given the impending election, once we completed our investigation, we moved quickly to take down this network in early March. It was early in its audience building and had almost no following in El Salvador when we removed it.

We found this network after reviewing research about some of this activity by FireEye, a cyber security company. Although the people behind this activity attempted to conceal their identities and coordination, our investigation found links to Spain-based employees of the Italian PR firm Reputation Up and individuals with a background in digital marketing working on behalf of the ARENA party in El Salvador.

- *Presence on Facebook and Instagram:* 118 Facebook accounts, 8 Pages and 10 accounts on Instagram.

- *Followers:* About 7,200 accounts followed one or more of these Pages, and about 40 people followed these Instagram accounts.

- *Advertising:* About $176,000 in spending for ads on Facebook and Instagram paid for primarily in US dollars.

Below is a sample of the content posted by some of these accounts and Pages.

Translation

Image overlay: Santa Tecla Informacion

Hacked Group

New Ideas ' We are 10 below"

Exclusive

Santa Tecla Infomacion

Translation

Caption: Santa Tecla deserves a Teclano #VoteForRoberto #robertodaubuisson #TheGoodContinues santatecla #elsalvador

Translation

Caption: I do not understand how Henry Flores believed that he would win against such great candidate like d'Aubuisson #robertodaubuisson #robertowins #IWontStayAtHome #VoteForRoberto #ThatTheGoodAdvance

04

We removed 390 Facebook accounts, six Pages and 17 Instagram accounts for violating our policy against [foreign interference](#) which is [coordinated inauthentic behavior](#) on behalf of a foreign entity. This network originated in Spain and Argentina and targeted Ecuador.

The people behind this network — which was active on multiple internet platforms — used recently-created fake accounts to pose as locals in Ecuador, post and comment on content and drive people to off-platform websites masquerading as news entities. This network appeared to have purchased inauthentic engagement from a 'like farm' in Bangladesh to make their content appear more popular than it was. They had nearly zero authentic following on our platform when we removed them last month and most of them were only active for several days in early February.

Some of their accounts used photos likely generated using machine learning techniques like generative adversarial networks (GAN). The people behind this activity posted in Spanish about news and political events in Ecuador, including the February 2021 presidential election and allegations of corruption against presidential candidate Arauz and his family. They also attempted to seed hashtags criticizing the Arauz candidacy.

We found this network after reviewing research about some of this activity on other platforms by FireEye, a cyber security company. Although the people behind this activity attempted to conceal their identities and coordination, our investigation found links to Leanga Software, a social media marketing company in Spain.

- *Presence on Facebook and Instagram:* 390 Facebook accounts, 6 Pages and 17 Instagram accounts.

- *Followers:* About 70 accounts followed one or more of these Pages and around 1,100 people followed one or more of these Instagram accounts.

- *Advertising:* About $900 in spending for ads on Facebook and Instagram paid for primarily in US dollars and Argentine peso.

Below is a sample of the content posted by some of these accounts and Pages.

Translation:

Caption: Sign up for [link] Be part of this story, this February 7, let's bring Ecuador forward. Let's take care of the votes of hope. Recovering the future is up to everyone.

Comment by this network's account: Part of a history that can change Ecuador, this is what I thought in 1998 when Chavez entered power, this is unforgettable, that's when the catastrophe began, we can not get carried away by repeated speeches, let's see history, analyze neighboring countries, the results that they have, how many Venezuelans are in Ecuador, let's ask what happened, do not make the mistake of falling into the socialist speech because it does not work, #arauzlies #arauziscorrupt

Translation

Caption: The mother of candidate Andrés Arauz signed contracts for $900k

Link: The mother of candidate signed contracts for $900k with UTM

Translation

Caption: Now is the time! This February 7, we will begin to recover the future of Ecuador. The people no longer want to waste more time, and they know we are the only option to recover employment, to make the vaccines reach everyone. All 1! The dignity of Ecuadorian families returns.

Comment by this network's account: No more lies, let's not forget what happened to the metro #arauzcorrupt

05

We removed 17 Facebook accounts, six Pages and three Instagram accounts for violating our policy against [foreign interference](#) which is [coordinated inauthentic behavior](#) on behalf of a foreign entity. This network originated in Egypt and targeted Ethiopia, Sudan and Turkey.

The people behind this network relied on a combination of authentic, duplicate and fake accounts, some of which used stock photos and went through significant name changes. These accounts were used to create and manage Pages posing as entities located in the countries they targeted. This network appeared to become particularly active in the summer of 2020. The people behind this activity posted in Amharic, Arabic and Turkish about news and political events in the countries they targeted, including positive commentary about the government of Egypt, Israel–Sudan relations and criticism of Turkish foreign policy and Ethiopia's mega dam project.

We found this network as part of our internal investigation into suspected coordinated inauthentic behavior in the region. Although the people behind it attempted to conceal their identities and coordination, our investigation found links to Bee Interactive, a marketing firm in Egypt.

- *Presence on Facebook and Instagram:* 17 Facebook accounts, 6 Pages and 3 Instagram accounts.

- *Followers:* About 304,000 accounts followed one or more of these Pages and around 800 people followed one or more of these Instagram accounts.

- *Advertising:* About $525,000 in spending for ads on Facebook and Instagram paid for primarily in Egyptian pounds and US dollars.

Below is a sample of the content posted by some of these accounts and Pages.

Translation:

Page name: The Pulse of Sudan

Caption: The sudden collapse of the "Bout Dam" destroys hundreds of homes in the Blue Nile state... What if the disastrous Renaissance Dam collapses?!

Translation:

Page name: Free Ethiopia

Caption: "Abdel Fattah El-Sisi: Egypt does not want to impede the development of the Ethiopian people. Egypt and Ethiopia are capable of negotiating, discussion and living in peace to resolve their differences."

Translation:

Page name: Sudan Today

Caption: Khartoum: Ethiopia's insistence on filling the Renaissance Dam is an ongoing violation of the law

06

We removed 37 Facebook accounts, 20 Pages and one Instagram account for violating our policy against [coordinated inauthentic behavior](). This domestic-focused network originated in Israel.

The people behind this activity used newly-created fake accounts — some of which had already been detected and disabled by our automated systems for spam — to post in Groups and Pages, amplify political content and manage Pages. The people behind this activity posted in Arabic about news and political events in Israel, including the March 2021 election, supportive commentary about the United Arab List party and criticism of its opponents, including the Joint List party. Once we completed our investigation, we took action against this network's accounts ahead of the March election. The campaign was early in its operation and had almost zero following when we took it down.

We found this activity as part of our internal investigation into suspected coordinated inauthentic behavior in the region. Our assessment benefited from information shared with us by local civil society in Israel. Although the people behind it attempted to conceal their identities and coordination, our investigation found links to ElBaladd, a news website in Israel.

- *Presence on Facebook and Instagram:* 37 Facebook accounts, 20 Pages, and 1 Instagram accounts.

- *Followers:* Less than 200 accounts followed one or more of these Pages and less than 70 people followed this Instagram account.

- *Advertising:* About $150 in spending for ads on Facebook and Instagram paid for in Israeli shekel.

Below is a sample of the content posted by some of these accounts and Pages.

Translation:

Caption: The Mansour Abbas Excuse

Translation:

Caption: I am with United Arab List

Translation:

Video caption: ...at the time that our society suffers from problems and crises that threaten our lives and our survival in this country...

07

We removed 21 Facebook accounts, 16 Pages and 9 Instagram accounts for violating our policy against [coordinated inauthentic behavior](). This network originated in Benin and targeted domestic audiences in that country.

The people behind this activity used fake accounts — some of which had already been detected and disabled by our automated systems — to comment, post in Groups and manage Pages. Some of these Pages posed as representing non-existent newspapers in Benin, posting fictitious screenshots of front page coverage. This network posted primarily in French about news and politics in Benin, including the April 2021 Presidential election, criticism of President Talon and other government officials and supportive commentary about Union Sociale Libérale (USL) party and its exiled leader Sebastien Ajavon. This network was early in its audience building when we removed it.

We found this network as part of our internal investigation into suspected coordinated inauthentic behavior in the region.

- *Presence on Facebook and Instagram:* 21 Facebook accounts, 16 Pages and 9 Instagram accounts.

- *Followers:* About 27,500 accounts followed one or more of these Pages and about 2,600 accounts followed one or more of these Instagram accounts.

- *Advertising:* About $120 in spending for ads on Facebook and Instagram paid for in US dollars.

Below is a sample of the content posted by some of these accounts and Pages.

Translation

Title: The Awakening

Headline: 25 legal cases against patrice talon filed since 2016

Translation

Caption: When Sébastien Ajavon makes Talon and his government bite the dust

The decision of the ACHPR asking the Beninese authorities to take the necessary measures...

Translation

Title: Today in Benin

Headlines: A disgusting bling on the backs of the people

A collective expulsion envisaged from the Presidency

Talon insolently spews untruths

Mahougnon Kapo must submit his resignation

08

We removed 33 Facebook accounts, 12 Pages and 5 Instagram accounts for violating our policy against [coordinated inauthentic behavior](). This network originated in Comoros and targeted domestic audiences in that country.

The people behind this activity used fake accounts — some of which had already been detected and disabled by our automated systems — to post and re-share links to off-platform news aggregating websites making this content appear more popular than it was, and manage Pages. Some of these Pages went through significant name changes over time. This network posted primarily in French and also in Arabic about news and current events in Comoros, particularly focusing on criticism of the opposition including allegations of corruption. This network was early in its audience building when we removed it.

We found this network as part of our internal investigation into suspected coordinated inauthentic behavior in the region. Although the people behind this activity attempted to conceal their identities and coordination, our investigation found links to Centre Médiatique Moderne des Comores (CMMC), a communications company in Comoros.

- *Presence on Facebook and Instagram:* 33 Facebook accounts, 12 Pages and 5 Instagram accounts.

- *Followers:* About 28,500 accounts followed one or more of these Pages and about 1,000 accounts followed one or more of these Instagram accounts.

- *Advertising:* Less than $4,000 in spending for ads on Facebook and Instagram paid for in US dollars and euros.

Below is a sample of the content posted by some of these Pages and accounts.

Translation

Caption: Confrontation between Madame Sabkia Ahmed Mze and Abdallah Agwa!

Translation

Caption: 'The Comoros have made their choice': Jean Yves Le Drian's response to deputy Jean Paul Le Roq.

Back to the sender. The vow expressed by deputy Jean Paul Le Roq is put in a garbage bag. The answer is scathing and needs to raise awareness of all these activists who flood Facebook and act against their own country through interposed networks. French Foreign Minister Jean Yves Le Drian responded to Communist deputy Jean Paul Le Coq explaining that France is not willing to interfere in the internal affairs of a sovereign state.

Translation

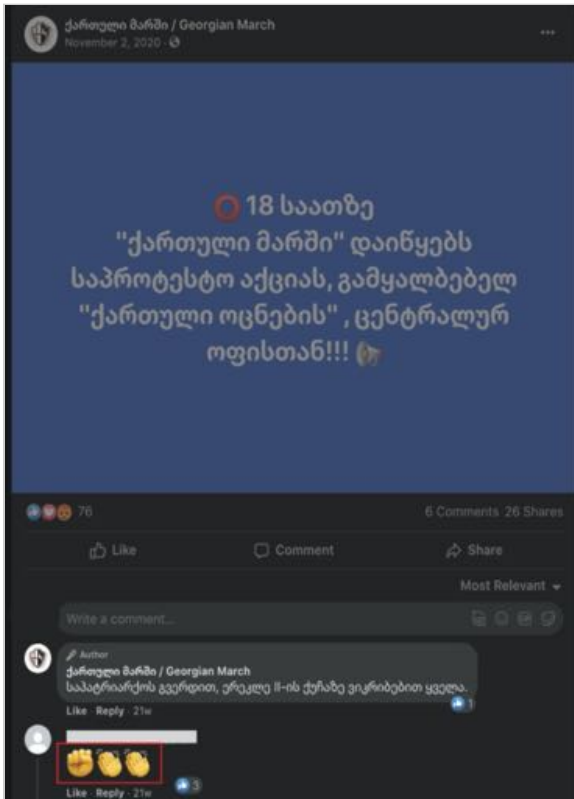**Image overlay:** Another opposition failure.

09

We removed 23 Facebook accounts, 24 Pages, 12 Groups and 11 Instagram accounts for violating our policy against [coordinated inauthentic behavior](#). This network originated in the country of Georgia and targeted domestic audiences in that country.

The people behind this activity used fake and duplicate accounts to post, comment and manage Pages and Groups. This network had multiple strikes for violating our Community Standards related to hate speech. They focused primarily on amplifying the content of Georgian March, a political party on the right in Georgia. This network posted in Georgian about news and current events including elections, claims of voter fraud, the covid-19 pandemic and criticism of US President Biden. This network was early in its operation when we removed it.

We found this network after reviewing public reporting on this activity by researchers at the Digital Forensic Research Lab at the Atlantic Council. Although the people behind this activity attempted to conceal their identities and coordination, our investigation found links to individuals associated with Georgian March, a political party in Georgia and its youth wing.

- *Presence on Facebook and Instagram:* 23 Facebook accounts, 24 Pages, 12 Groups and 11 Instagram accounts.

- *Followers:* About 119,000 accounts followed one or more of these Pages, around 10,500 people joined one or more of these Groups and about 1,600 accounts followed one or more of these Instagram accounts.

- *Advertising:* Around $1,000 in spending for ads on Facebook and Instagram paid for in US dollars.

- *Events:* 10 events were hosted by these Pages. Up to 5,150 people expressed interest in at least one of these events. We cannot confirm whether any of these events actually occurred.

Below is a sample of the content posted by some of these Pages and accounts.
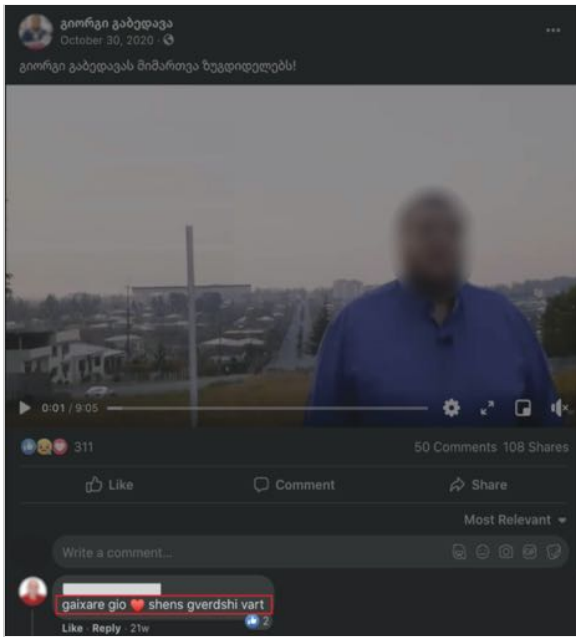
Translation

Caption: 🔴 At 18 o'clock Georgian March will start protest against falsifier Georgian Dream, at their central Office!!! 📢

Comment by this network's account: ✊👏👏

Translation

Caption: Scandalous announcement from Georgian March ➡ Sandro Bregadze claims that Georgian Dream offered him a deal

Translation

Caption: Giorgi Gabedava addressing Zugdidi residents

Comment by this network's account: cheers gio <3 we are with you

10

We removed 71 Facebook accounts, 18 Pages and seven Instagram accounts for violating our policy against [coordinated inauthentic behavior](). This network originated in Mexico and focused on the state of Quintana Roo in Mexico.

The people behind this activity used fake accounts to post, comment and manage Pages. They also commented on content posted by official Pages of various candidates in the legislative election. The people behind this campaign posted in Spanish about news and current events in Quintana Roo, including the MORENA party, senator Marybel Villlegas Canché, and criticism of her opponent Mara Lezama. They also posted about public consultation related to the water supply situation in various municipalities, including corruption allegations related to one of the water services providers. This network was early in its audience building when we removed it.

We found this activity as part of our internal investigation into suspected coordinated inauthentic behavior in the region. Although the people behind it attempted to conceal their identities and coordination, our investigation found links to individuals in the state of Quintana Roo in Mexico

- *Presence on Facebook and Instagram:* 71 Facebook accounts, 18 Pages and 7 Instagram accounts.

- *Followers:* Around 10,500 accounts followed one or more of these Pages and around 300 people followed one or more of these Instagram accounts.

- *Advertising:* Around $4,100 in spending for ads on Facebook and Instagram paid for in Mexican peso.

Below is a sample of the content posted by some of these Pages and accounts.
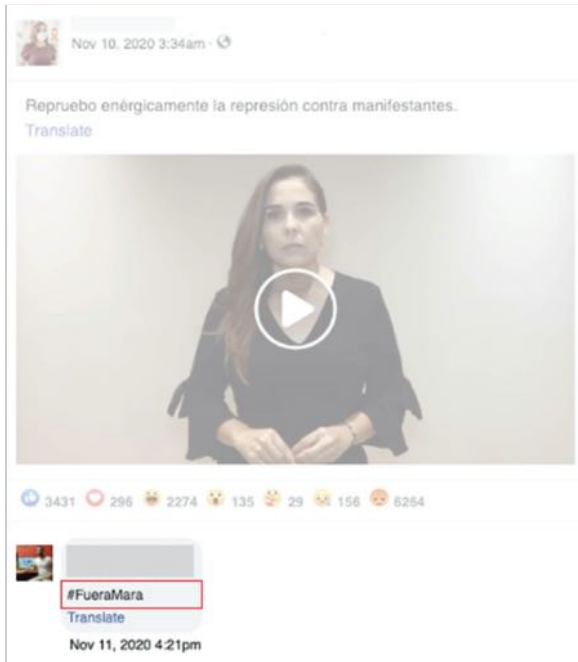

Translation

Caption: #Don'tLowerYourGuard

Link: Marybel Villegas calls for people to keep taking care due to the increase in infections in Quintana Roo

Translation

Caption: Citizens committed to #QuintanaRoo exercising Rights for a Constitutional Citizen Consultation for Revocation of Aguakan Enterprise Contract with #QRoo for #Corruption #FakeServices #Overpricing #Ecocide #EnvironmentalDamage

Translation

Caption: I energetically condemn the repression against protesters.

Comment by this network's account: #MaraOut

11

We removed 56 Facebook accounts for violating our policy against [coordinated inauthentic behavior](#). This network originated in Mexico and focused on the state of Colima in Mexico.

The people behind this activity used fake accounts — some of which had already been detected and disabled by our automated systems — to like, post and amplify content from an official Page of the member of Congress from the Colima state in Mexico. The people behind this campaign posted in Spanish about news and current events in Colima, including the election campaign of the former congresswoman Claudia Yáñez Centeno. This network was early in its operation when we removed it.

We found this activity as part of our internal investigation into suspected coordinated inauthentic behavior in the region. Although the people behind it attempted to conceal their identities and coordination, our investigation found links to individuals in Colima, Mexico.

- *Presence on Facebook:* 56 Facebook accounts.

Below is a sample of the content posted by some of these accounts.

Mar 8, 2021 2:14pm · 🌐

DEPOLITICAYALGOMAS.ES
Claudia Yáñez arrancará su campaña este lunes 8, en el Parque Hidalgo de la ciudad de Colima

Translation

Caption: "Claudia Yanez will start her campaign Monday the 8th in the city of Colima's Hidalgo park. "

Translation

Caption: #Elections In an exclusive interview with the journalist Arturo Avalos, General Director of Politics and Something Else, the legislator denounced a 'cargada' by the CEN Morena and some officials of the Mexican government in order to help her opponent Indira Vizcano

Comment by this network's account: To vote for indicorrupta is to return to the past...where the PRI will govern us again and we don't want that ...we want a change and this will only become reality if Claudia Yánez becomes governor.

Translation

Caption: Congratulations Deputy Claudia

12

We removed 54 Facebook accounts and 73 Pages for violating our policy against [coordinated inauthentic behavior](#). This network originated in Mexico and focused on the state of Baja California in Mexico.

The people behind this activity used fake accounts — many of which had already been detected and disabled by our automated systems — to like, comment and re-share content about the MORENA party and its candidates in Baja California. They also created Pages designed to look like user profiles — using false names and stock images — to comment and amplify particular content. The people behind this campaign posted in Spanish about the upcoming gubernatorial election in Baja California and supportive commentary about the candidacy of former Tijuana mayor Arturo González Cruz, including on his official Page. This network was early in its audience building and had nearly zero following when we removed it.

We found this activity as part of our internal investigation into suspected coordinated inauthentic behavior in the region. Although the people behind it attempted to conceal their identities and coordination, our investigation found links to individuals in Mexico.

- *Presence on Facebook and Instagram:* 54 Facebook accounts and 73 Pages.

- *Followers:* Around 10 accounts followed one or more of these Pages.

Below is a sample of the content posted by some of these Pages and accounts.

Translation

Caption: #Live | PART 1 The municipal president, Arturo González is in Sanchez Taboada to monitor the installation of a drinking water network in De Las Palmas street in the colony Villa de las Palmas.

Translation

Caption: #Live Starts the Sanitizing Day on Cruise 5 and 10, Boulevard Díaz Ordaz, Colonia Gas in La Mesa, which is carried out with the support of citizens.

Translation

Caption: #Live We are in La Mesa, to bring the services offered by the municipal government to the most vulnerable part of the population, so this morning 50 elderly residents of the Quinta Alta colony, will receive blankets, pantries, hygiene materials and meals, which will help them to keep warm and enjoy the festivities. #TodayEveryoneForTijuana #ThisChristmasGivesHealth

13

We removed 39 Facebook accounts, 15 Pages and eight Instagram accounts for violating our policy against [coordinated inauthentic behavior](#). This domestic-focused network originated in Mexico.

The people behind this activity used fake accounts — some of which had already been detected and disabled by our automated systems — to react to, comment and re-share content to make it appear more popular than it was. They also created Pages posing as news entities and local community Pages. This network posted memes and other content in Spanish about entertainment; upcoming elections; sports; government economic policies; Salinas Group, a conglomerate in Mexico; gaming; public figures; progress in covid vaccination; the lessening of pandemic-related restrictions, and commentary both supporting and criticizing the president of Mexico. This network was early in its audience building when we removed it.

We found this activity as part of our internal investigation into suspected coordinated inauthentic behavior in the region. Although the people behind it attempted to conceal their identities and coordination, our investigation found links to Flow Agency, a PR firm in Mexico.

- *Presence on Facebook and Instagram:* 39 Facebook accounts, 15 Pages and 8 Instagram accounts.

- *Followers:* Around 12,000 accounts followed one or more of these Pages and around 100 people followed one or more of these Instagram accounts.

- *Advertising:* Around $14,000 in spending for ads on Facebook and Instagram paid for in Mexican peso.

Below is a sample of the content posted by some of these Pages and accounts.

Translation

Caption: #BeStrongPresident We know you can handle this and more...

Translation

Caption: Share it, share, share!

Image overlay: Mr Failure, share it if you agree

Translation

Caption: We needed this news! An 86-year-old grandfather gets cured! Upload it! Covid-19 is not instant death. Let's lower the panic and take care of ourselves with all the necessary measures to avoid contagion. #wehaveanotherdata. Give us your like.

Image overlay: These are good news!

14

We removed 151 Facebook accounts, 14 Pages, and 63 Instagram accounts for violating our policy against [coordinated inauthentic behavior](). This network originated in Mexico and focused on the state of Nayarit in Mexico.

The people behind this activity used compromised and fake accounts — some of which had already been detected and disabled by our automated systems — to react to, comment and re-share content related to several public officials in the state of Nayarit, including posts by the official Page of Eduardo Lugo, a public official in Nayarit. Some of the Pages managed by this network posed as local news pages. This network posted in Spanish about news and current events in Mexico, including the upcoming mayoral and gubernatorial elections in Mexico, a politician Eduardo Lugo and Miguel Ángel Navarro Quintero, a senator for Nayarit. This network was early in its operation when we removed it.

We found this activity as part of our internal investigation into suspected coordinated inauthentic behavior in the region. Although the people behind it attempted to conceal their identities and coordination, our investigation found links to individuals in the state of Nayarit in Mexico.

- *Presence on Facebook and Instagram:* 151 Facebook accounts, 14 Pages, and 63 Instagram accounts.

- *Followers:* Around 112,000 accounts followed one or more of these Pages and around 10,000 people followed one or more of these Instagram accounts.

- *Advertising:* Around $300 in spending for ads on Facebook and Instagram paid for primarily in Mexican peso.

Below is a sample of the content posted by some of these Pages and accounts.
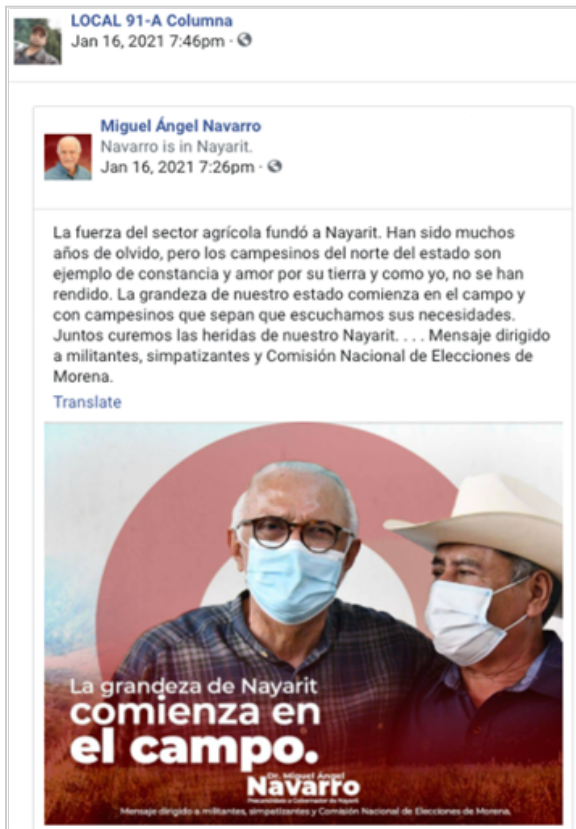
Translation

Caption: The strength of the agricultural sector founded Nayarit. It's been many years of oblivion, but the upstate farmworkers are an example of constancy and love for their land and like me, they haven't given up. The greatness of our state begins on the field and with farmworkers who know that we listen to their needs. Together we heal the wounds of our Nayarit. . . Message addressed to militants, supporters, and the National Committee of MORENA.

Translation

Caption: Deputy Eduardo Lugo, registered to compete for the mayor of Santiago Ixcuintla. Eduardo Lugo registered as PreCandidate of MORENA, to contend for the Mayor of Santiago Ixcuintla, in which after a series of surveys conducted by various polling institutes, he has shown that he will be the next Municipal President - since the results of these surveys position him as a winner. #AmanecerInformado

Translation

Caption: More vaccines have arrived in our state, this second batch has 975 new doses of the Covid-19 vaccine for medical staff dealing with this virus. I want to congratulate our President Andrés Manuel López Obrador and Governor Antonio Echevarría Garcia on the arrival of this valuable shipment, we continue to work in all levels of government to deal with this evil. #AndresManuelLopezObrador #AntonioEcheverriaGarcia #DiputadoEduardoLugo

#Nayarit #Health #Covid19

IN DEPTH ANALYSIS OF
THE ALBANIA-BASED NETWORK (#01)

COORDINATED INAUTHENTIC BEHAVIOR FROM AN APPARENT MEK TROLL FARM

By Ethan Fecht, Intelligence Analyst, Ben Nimmo, Global IO Threat Intelligence Lead and the IO Threat Intelligence Team

We removed a network of over 300 Facebook accounts, Pages, Groups and accounts on Instagram that appear to be run from a troll farm located in Albania and operated by the Mojahedin-e Khalq (MEK) organization. They targeted primarily Iran and also global audiences with content related to Iran. The network violated our policy against foreign interference which is coordinated inauthentic behavior on behalf of a foreign entity.

- *Presence on Facebook and Instagram:* 128 accounts, 41 Pages, 21 Groups, and 146 Instagram accounts.

- *Followers:* About 9,000 accounts followed one or more of these Pages, about 150 accounts joined at least one of these Groups and around 112,000 people followed one or more of these Instagram accounts.

KEY FINDINGS:

- **Detection**: As part of a proactive investigation, we uncovered three separate clusters of activity that led to identifying the full scope of the operation. This included consistent and long-running infrastructure connections between the fake accounts and authentic accounts of MEK-linked individuals and Pages operated from Albania.
- **Behavior**: This network appears to have been most active in 2017, with another spike in activity in the second half of 2020. They posted at high volumes, and all but a handful of assets failed to build an audience on our platform. This campaign appeared to operate according to a shift pattern on Central European Time, with a dip in activity in the early afternoon consistent with a lunch break, and a nearly complete pause overnight.
  The people behind this activity relied on a combination of authentic and fake accounts to post MEK-related content and comment on their own and other people's posts, including those of international news organizations like Radio Liberty, Voice of

America, and BBC. They also frequently posted links to websites and other social media channels affiliated with MEK.

This network almost exclusively posted about events in, or related to, Iran. It routinely praised the activity of MEK and its leaders and criticized the Iranian government.

- **Network**: The operation was unusual for the very dense technical connections between its accounts. Most of its accounts were run by operators in Albania who routinely shared technical infrastructure. This meant that the same operator was able to run multiple accounts; conversely, multiple operators were able to run the same account. These are some of the hallmarks of a so-called troll farm — a physical location where a collective of operators share computers and phones to jointly manage a pool of fake accounts as part of an influence operation.
- **Inauthenticity**: The network used a variety of tactics to disguise its fake accounts, a significant portion of which had been detected and disabled by our automated systems over the years this operation was running.
Some of these accounts used photos of Iranian celebrities, deceased dissidents, models and children as their profile pictures. Others used landscape shots. A handful of the more recent creations appear to have used photos likely generated using machine learning techniques like generative adversarial networks (GAN). Many of the accounts went through significant name changes over time.
- **Continuous Enforcement:** Networks that rely on large numbers of centrally-run fake accounts are particularly prone to continuous detection and enforcement, as they depend on having a large, noisy presence online. We will continue to monitor for attempts to re-establish an inauthentic network by the people behind this campaign on our platform and will take action if we find further violations.

DETECTION

We uncovered this network during an investigation into possible inauthentic behavior. Using a range of technical and behavioral indicators, our team identified what appeared to be three separate clusters of inauthentic activity. As the investigation progressed, it became clear that all three were part of one sprawling network that leveraged both authentic and inauthentic accounts.

These accounts were tightly connected through a range of infrastructure signals. The connections were so consistent and dense that they suggested an operation which was run from a single physical location. As we continued to investigate, we found long-running

infrastructure connections between the fake accounts and authentic accounts of MEK-linked individuals based in Albania and MEK-affiliated Pages.

Open-source reports have previously described MEK as running a "vast and tightly guarded barracks" near the Albanian capital. In these reports, a number of former members have claimed that MEK is running a troll farm, with MEK personnel operating social media accounts from centrally purchased computers that were allegedly paid for in cash. In the words of one witness, "They would tell us that the devices provided by the organization were like weapons, and our tweets were bullets to shoot at the enemy."

ATTRIBUTION

Our investigation linked this activity to MEK based on a number of technical signals. This includes consistent and long-running infrastructure connections between the fake accounts and authentic accounts of MEK-linked individuals and Pages based in Albania. The majority of posts were made during the hours of a daytime shift on Central European Time.

While content-based clues aren't strong signals for attribution, they may help corroborate the attribution assessment when combined with the high-confidence technical indicators. In this case, the majority of external domains shared by this network on our platform were either overt MEK websites or websites that amplified MEK positions but did not disclose any links to the organization and its leaders. The network's posts consistently supported MEK and criticized the Iranian government.

The operation's behavior was also consistent with public reporting about activity on other social media platforms which originated from MEK's compound in Albania.

INAUTHENTIC ACCOUNTS

The operation relied heavily on fake accounts to post and amplify its messages. Some of these accounts went through repeated name changes. Other accounts used the names of deceased members of MEK. Some claimed to be located in Iran but were operated from Albania. All the accounts were overt in their support for MEK and their criticism of the Iranian government.

The fake accounts used a range of profile pictures to disguise themselves. Some were portraits of prominent people, including Iranian poet Forugh Farrokhzad and Spanish poet Federico García Lorca. Others were landscape photos, images of children or models.
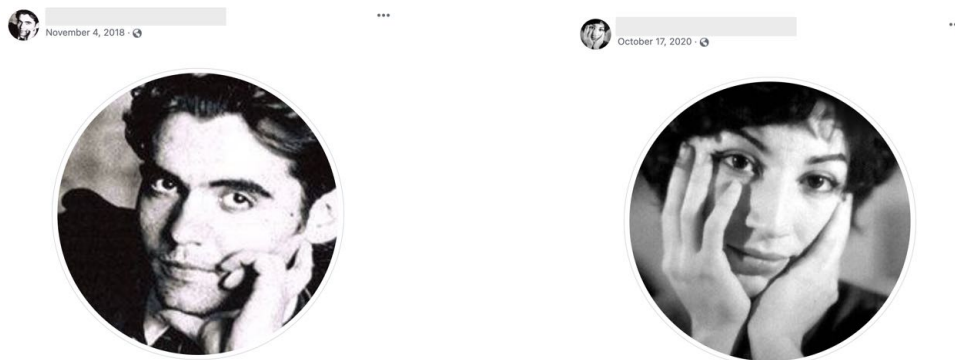
Images: Profile pictures of two of the accounts in the network, whose photos were taken from Spanish poet Federico García Lorca and Iranian poet Forugh Farrokhzad.

A handful of more recent Instagram accounts — created in or after March 2019 — used profile pictures that were likely generated using machine learning techniques like generative adversarial networks (GAN). These can often be recognized by telltale errors, as the computer generation process has been <u>observed</u> to misrepresent some details of human faces, accessories and backgrounds. For example, GAN images can feature unnaturally distorted backdrops or facial features. GAN-generated faces that are portrayed as wearing glasses often depict frames that are asymmetrical, with different legs, hinges and connections on each side.

Image: Detail of a profile picture generated by AI, showing the asymmetrical frame of the glasses.

NETWORK BEHAVIOR

This operation was unusual for the dense web of infrastructure connections between its accounts. They were organized into subgroups of various sizes, which slightly differed in their infrastructure but were still connected to one another through a range of technical

indicators. The effect was a large pool of inauthentic and authentic accounts that were centrally operated and shared between operators.

Fake accounts formed the backbone of the operation, with Pages and Groups playing a relatively minor role. Some of the accounts were a decade old when we disrupted the network, but the majority were created between 2014 and 2016, with a particular burst of account creation in 2016. Over the years, our automated systems detected and disabled a significant portion of this network's assets.

The operation posted at high volumes, and often shared the same content across multiple accounts. It was particularly active in 2016-17, reduced its activity sharply in 2018-19, and ramped up its posting again through 2020. We didn't see evidence of the use of automation to run these assets. Our own automated systems disabled some of the accounts for violating our Community Standards against violence and incitement.
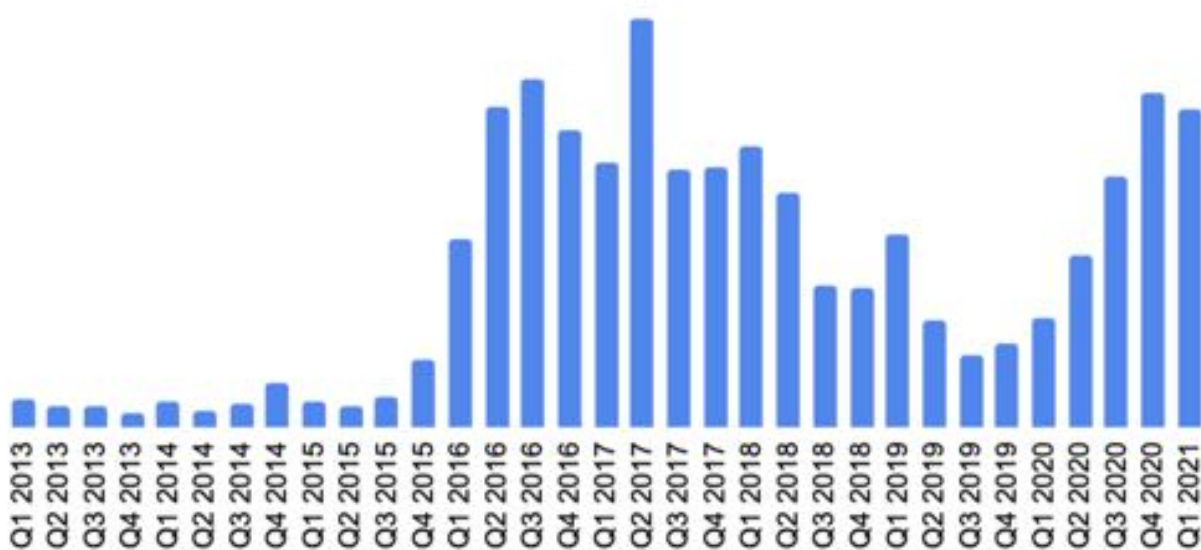
Image: Timeline of posting activity on Facebook, 2013-2021

The operation manifested slightly differently on Facebook and Instagram. On Facebook, these accounts primarily focused on posting to their own timelines, with commenting on other people's posts being only a small portion of the activity. On Instagram, the majority of the activity was commenting on other people's content. In particular, they frequently commented on Instagram posts by MEK-branded accounts, in addition to news organizations like Radio Liberty's Farsi service, the Voice of America Farsi service, and the BBC Persian service. Some of the comments bore no relation to the context of the posts they were commenting on.
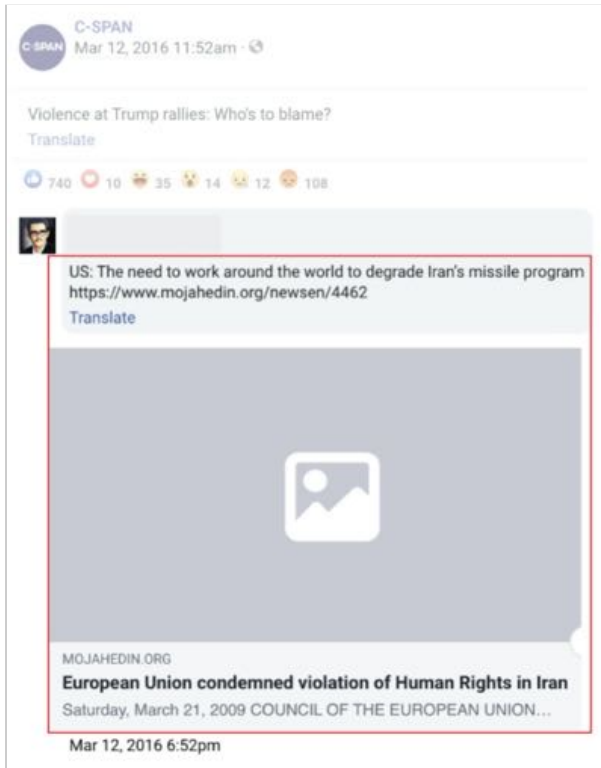
Image: Post by a Facebook account in the network, replying to a C-SPAN post from 2016 that asked, "Violence at Trump rallies: Who's to blame?"

The MEK account replied with a comment about Iran's missile program, but attached a link to an article from 2009 on the MEK website about the EU's condemnation of human rights violations in Iran.

Despite the high volume of posts and comments, most of the operation's activity achieved little to no audience visibility. Its Pages and Groups attracted very few followers. Its Instagram accounts performed slightly better, but averaged just over 700 followers each.

The operation put particular effort into driving people to off-platform websites run by, or associated with, MEK. This included MEK's official website, other websites linked to the organization, and a number of websites that appeared to be independent, but which amplified MEK's official positions. Some of the accounts also shared links to MEK-associated channels on other platforms, notably Periscope and YouTube.
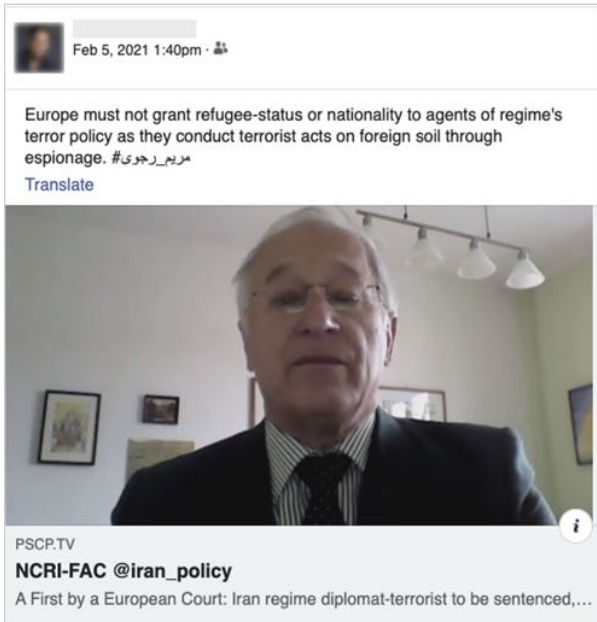
Image: Post by an account in the network sharing a link to the Periscope channel of the MEK–affiliated National Council of Resistance of Iran. This was one of the few posts that were made in English.

The accounts consistently posted during working hours Central European Time in what appears to be shifts. This activity ran seven days a week, with a daily spike in posting from 8–10 am and an even larger spike from 6–10 pm. Posts dropped off sharply between 12 noon and 1 pm during lunch hours, and fell to virtually nothing during the night in Albania.
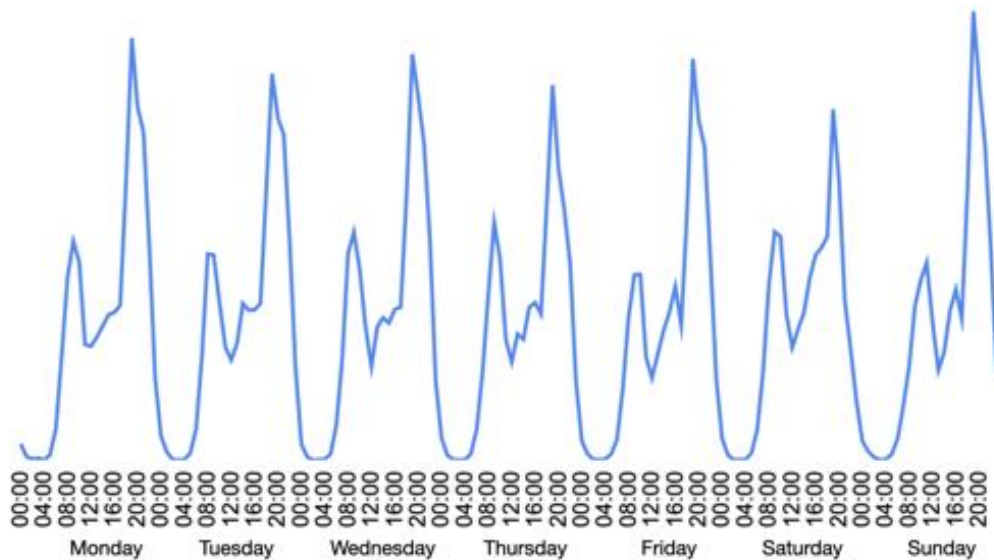
Graph: Posting frequency by day of the week, Monday through Sunday, CET.

The operators used their accounts to post content that praised MEK and its leaders and criticized the Iranian government, and to comment on posts by news outlets, public figures, and other organizations. The operation primarily posted in Farsi, with some posts in Arabic or English.

Below is a sample of the content posted by some of these Pages and accounts:

Translation:

Caption: The ship of the clerical system is in crisis... #Economic_Crisis #Clergy

#Tick_tock_suppression #expensive #Iranian economy #poor #suppression

Translation

Caption: A campaign on the cusp of the presidential election stage in Iran. No to fake elections.. Yes to the Democratic Republic. The demand of resistance and the Iranian people, the establishment of a pluralistic democratic republic as a result of free and fair elections Saturday 3 April 2021 6:30 pm est #Mecca آریبهجمهوری_دمکراتیك# #MyVoteRegimeChange

Image overlay: A storm of tweets _ Ar y_ has _ its _ audience _ Damascus _ yes to a Democratic Republic, no to the elections to a fake Saturday, April 3, 2021 18:30 Mecca time

Translation:

Comment by this network's account: Soon a verdict will be issued against the terrorist Asadullah Asadi. But its meaning is a trial of the entire "mullah regime," and they should close the "mullah embassies," which are dens of spying and terrorism.

Translation

Video caption: Inauguration of the New Year delivery program for internet connection to Iranians around the world.

Comment by this network's account: #Maryam _ Rajavi is the high command of the Iranian people to achieve the aspirations of freedom, justice and human dignity. The symbol of the Iranian woman's release from the fork of Shah and Sheikh's resilience. Just as the king was terrified by the name of Massoud Rajavi and Mosi Street, the Sheikh and the buried monarchs of the king tremble with the name of Maryam Rajavi... but by the saying of Massoud, the great commander of Iran

Is it possible to stop spring from coming, is it possible to stop the sun from shining and the wind from blowing..... No never... Freedom will soon come true with the ultimate uprising of our people... And the light of Iran, the earth means Maryam Pak, the release of the crad Drink milk and it will come back…

Translation

Comment by this network's account: The Mojahedin-e Khalq are the strongest opposition group in order to organize and execute their resources inside the country, they were able to publish the information of the secret tunnels of the IRGC in the construction of ballistic missiles.