



ID: 343165

Sample Name:

AAKANDEVAND.exe

Cookbook: default.jbs

Time: 13:01:39

Date: 22/01/2021

Version: 31.0.0 Red Diamond

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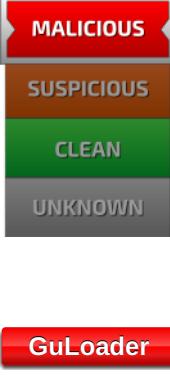
Analysis Report AAKANDEVAND.exe

Overview

General Information

Sample Name:	AAKANDEVAND.exe
Analysis ID:	343165
MD5:	2c36dc4149f0ac..
SHA1:	50c69661aad974..
SHA256:	4fc39458be70fe1..
Most interesting Screenshot:	

Detection


GuLoader
Score: 84
Range: 0 - 100
Whitelisted: false
Confidence: 100%

Signatures

Antivirus / Scanner detection for sub...
Multi AV Scanner detection for subm...
Yara detected GuLoader
Contains functionality to detect hard...
Detected RDTSC dummy instruction...
Tries to detect sandboxes and other...
Tries to detect virtualization through...
Yara detected VB6 Downloader Gen...
Abnormal high CPU Usage
Contains functionality for execution ...
Contains functionality to query CPU ...
Contains functionality to read the PEB

Classification



Startup

- System is w10x64
- AAKANDEVAND.exe (PID: 6676 cmdline: 'C:\Users\user\Desktop\AAKANDEVAND.exe' MD5: 2C36DCD4149F0AC440632B7FEFB30415)
- cleanup

Malware Configuration

No configs have been found

Yara Overview

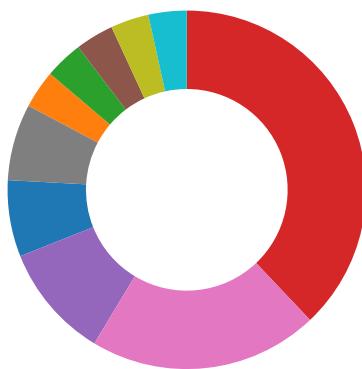
Memory Dumps

Source	Rule	Description	Author	Strings
Process Memory Space: AAKANDEVAND.exe PID: 6676	JoeSecurity_VB6DownloaderGeneric	Yara detected VB6 Downloader Generic	Joe Security	
Process Memory Space: AAKANDEVAND.exe PID: 6676	JoeSecurity_GuLoader	Yara detected GuLoader	Joe Security	

Sigma Overview

No Sigma rule has matched

Signature Overview



- AV Detection
- Compliance
- Key, Mouse, Clipboard, Microphone and Screen Capturing
- System Summary
- Data Obfuscation
- Hooking and other Techniques for Hiding and Protection
- Malware Analysis System Evasion
- Anti Debugging
- HIPS / PFW / Operating System Protection Evasion
- Language, Device and Operating System Detection

Click to jump to signature section

AV Detection:



Antivirus / Scanner detection for submitted sample

Multi AV Scanner detection for submitted file

Compliance:



Uses 32bit PE files

Data Obfuscation:



Yara detected GuLoader

Yara detected VB6 Downloader Generic

Malware Analysis System Evasion:



Contains functionality to detect hardware virtualization (CPUID execution measurement)

Detected RDTSC dummy instruction sequence (likely for instruction hammering)

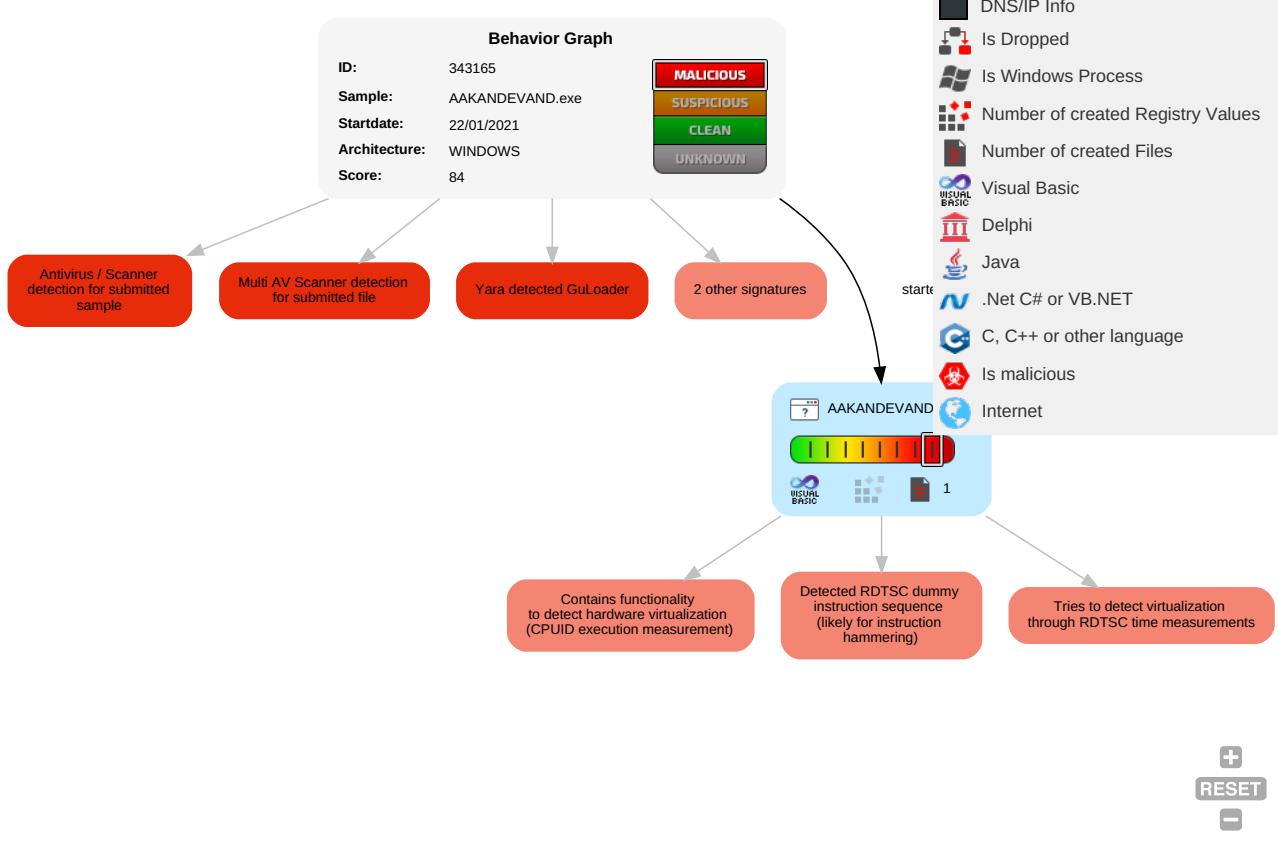
Tries to detect sandboxes and other dynamic analysis tools (process name or module or function)

Tries to detect virtualization through RDTSC time measurements

Mitre Att&ck Matrix

Initial Access	Execution	Persistence	Privilege Escalation	Defense Evasion	Credential Access	Discovery	Lateral Movement	Collection	Exfiltration	Command and Control	Network Effects	Remote Service Effects
Valid Accounts	Windows Management Instrumentation	Path Interception	Process Injection 1	Process Injection 1	Input Capture 1	Security Software Discovery 4 1 1	Remote Services	Input Capture 1	Exfiltration Over Other Network Medium	Encrypted Channel 1	Eavesdrop on Insecure Network Communication	Remotely Track Device Without Authorization
Default Accounts	Scheduled Task/Job	Boot or Logon Initialization Scripts	Boot or Logon Initialization Scripts	Obfuscated Files or Information 1	LSASS Memory	Process Discovery 1	Remote Desktop Protocol	Archive Collected Data 1	Exfiltration Over Bluetooth	Junk Data	Exploit SS7 to Redirect Phone Calls/SMS	Remotely Wipe Data Without Authorization
Domain Accounts	At (Linux)	Logon Script (Windows)	Logon Script (Windows)	Obfuscated Files or Information	Security Account Manager	System Information Discovery 3 1 1	SMB/Windows Admin Shares	Data from Network Shared Drive	Automated Exfiltration	Steganography	Exploit SS7 to Track Device Location	Obtain Device Cloud Backups

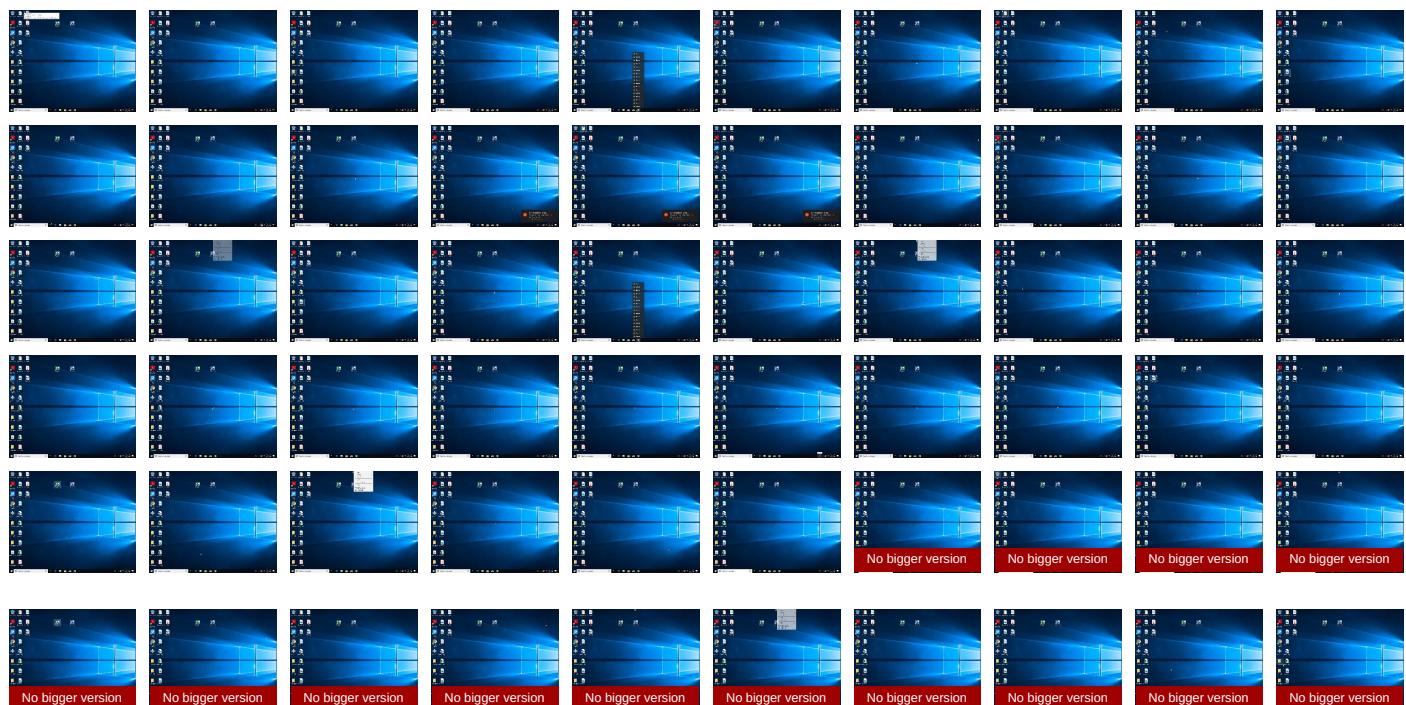
Behavior Graph

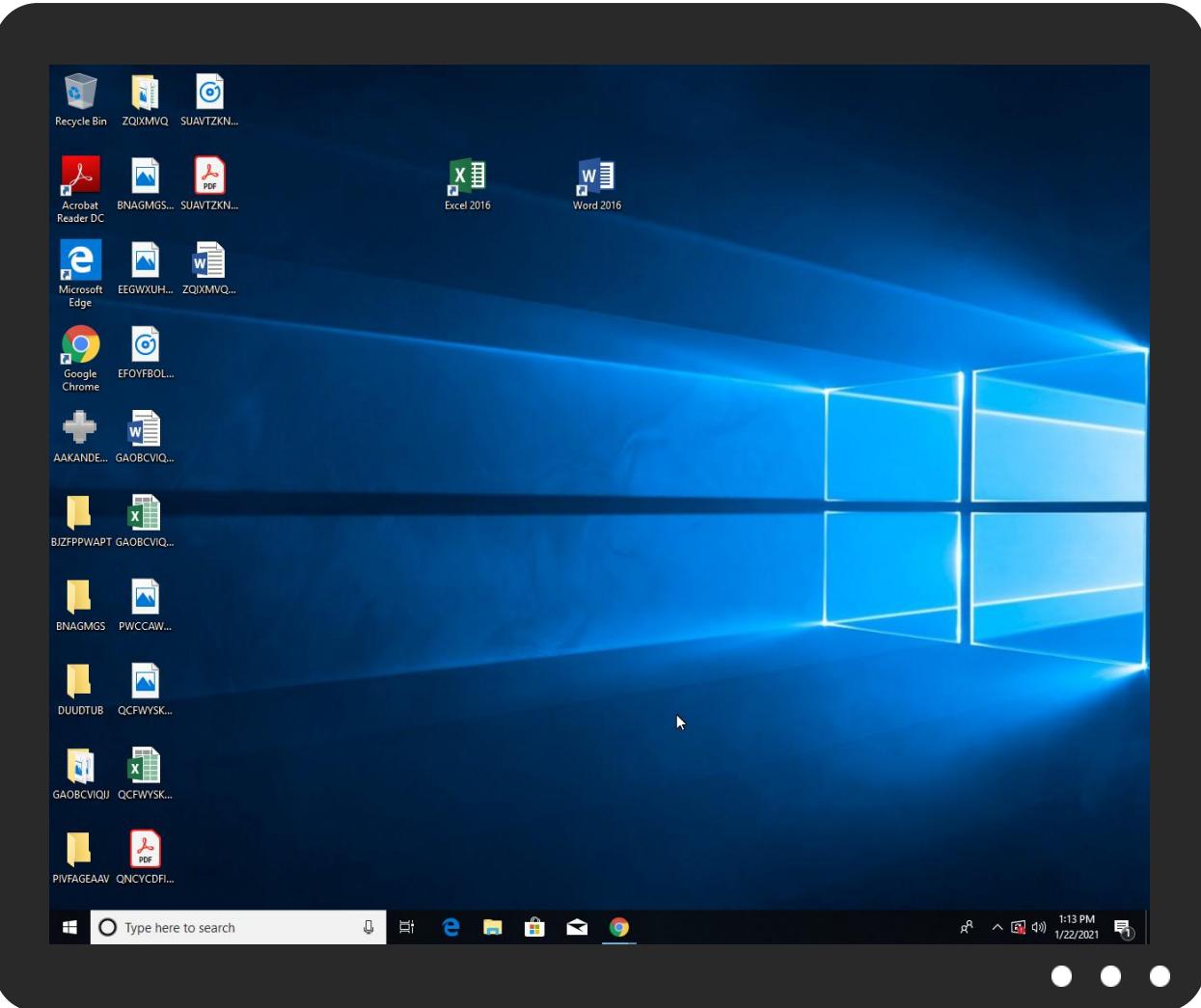


Screenshots

Thumbnails

This section contains all screenshots as thumbnails, including those not shown in the slideshow.





Antivirus, Machine Learning and Genetic Malware Detection

Initial Sample

Source	Detection	Scanner	Label	Link
AAKANDEVAND.exe	19%	Virustotal		Browse
AAKANDEVAND.exe	11%	ReversingLabs	Win32.Trojan.Generic	
AAKANDEVAND.exe	100%	Avira	HEUR/AGEN.1136443	

Dropped Files

No Antivirus matches

Unpacked PE Files

Source	Detection	Scanner	Label	Link	Download
0.0.AAKANDEVAND.exe.400000.0.unpack	100%	Avira	HEUR/AGEN.1136443		Download File
0.2.AAKANDEVAND.exe.400000.0.unpack	100%	Avira	HEUR/AGEN.1136443		Download File

Domains

No Antivirus matches

URLs

No Antivirus matches

Domains and IPs

Contacted Domains

No contacted domains info

Contacted IPs

No contacted IP infos

General Information

Joe Sandbox Version:	31.0.0 Red Diamond
Analysis ID:	343165
Start date:	22.01.2021
Start time:	13:01:39
Joe Sandbox Product:	CloudBasic
Overall analysis duration:	0h 13m 10s
Hypervisor based Inspection enabled:	false
Report type:	light
Sample file name:	AAKANDEVAND.exe
Cookbook file name:	default.jbs
Analysis system description:	Windows 10 64 bit v1803 with Office Professional Plus 2016, Chrome 85, IE 11, Adobe Reader DC 19, Java 8 Update 211
Number of analysed new started processes analysed:	40
Number of new started drivers analysed:	0
Number of existing processes analysed:	0
Number of existing drivers analysed:	0
Number of injected processes analysed:	0
Technologies:	<ul style="list-style-type: none">• HCA enabled• EGA enabled• HDC enabled• AMSI enabled
Analysis Mode:	default
Analysis stop reason:	Timeout
Detection:	MAL
Classification:	mal84.troj.evad.winEXE@1/0@0/0
EGA Information:	Failed
HDC Information:	<ul style="list-style-type: none">• Successful, ratio: 29.8% (good quality ratio 17.3%)• Quality average: 31.3%• Quality standard deviation: 31.5%
HCA Information:	Failed
Cookbook Comments:	<ul style="list-style-type: none">• Adjust boot time• Enable AMSI• Found application associated with file extension: .exe• Override analysis time to 240s for sample files taking high CPU consumption
Warnings:	Show All <ul style="list-style-type: none">• Exclude process from analysis (whitelisted): MpCmdRun.exe, audiodg.exe, BackgroundTransferHost.exe, RuntimeBroker.exe, WMIADAP.exe, MusNotifyIcon.exe, backgroundTaskHost.exe, conhost.exe, SgrmBroker.exe, svchost.exe, wuapihost.exe

Simulations

Behavior and APIs

No simulations

Joe Sandbox View / Context

IPs

No context

Domains

No context

ASN

No context

JA3 Fingerprints

No context

Dropped Files

No context

Created / dropped Files

No created / dropped files found

Static File Info

General

File type:	PE32 executable (GUI) Intel 80386, for MS Windows
Entropy (8bit):	5.720231484578821
TrID:	<ul style="list-style-type: none">• Win32 Executable (generic) a (10002005/4) 99.15%• Win32 Executable Microsoft Visual Basic 6 (82127/2) 0.81%• Generic Win/DOS Executable (2004/3) 0.02%• DOS Executable Generic (2002/1) 0.02%• Autodesk FLIC Image File (extensions: flc, fli, cel) (7/3) 0.00%
File name:	AAKANDEVAND.exe
File size:	69632
MD5:	2c36dc4149f0ac440632b7fefb30415
SHA1:	50c69661aad974ef9852b1eaaaf498ad2181a19d7
SHA256:	4fc39458be70fe1ff6dba1459b565e7bfd171125a189521a7c309c55bef19037
SHA512:	7a35953d90f05f0bf88ebef342ceb7bb36c38b6958dd639b81b1a65907ee23aa1df76da2dc5da5c306a79b47490426bb2a6d6c0433cb8be98d5dd429acd296e
SSDEEP:	768:xlisFjh8oPDYI1elzOOU8oLfVm+hVNs5UQPL5g5eu c8RZz9SueQ:xNsFjNbYllzOON4VruLPO5Fc8RZz9d

General

File Content Preview:

MZ.....@.....!..L!Th
is program cannot be run in DOS mode....\$.....#.B...B
...B..L^...B...`...B..d...B..Rich.B.....PE..L.....yP.....
.....0.....T.....@.....

File Icon



Icon Hash:

f030f0c6f030b100

Static PE Info

General

Entrypoint:	0x401354
Entrypoint Section:	.text
Digitally signed:	false
Imagebase:	0x400000
Subsystem:	windows gui
Image File Characteristics:	LOCAL_SYMS_STRIPPED, 32BIT_MACHINE, EXECUTABLE_IMAGE, LINE_NUMS_STRIPPED, RELOCS_STRIPPED
DLL Characteristics:	
Time Stamp:	0x5079FFFE [Sat Oct 13 23:57:50 2012 UTC]
TLS Callbacks:	
CLR (.Net) Version:	
OS Version Major:	4
OS Version Minor:	0
File Version Major:	4
File Version Minor:	0
Subsystem Version Major:	4
Subsystem Version Minor:	0
Import Hash:	e22238527efb5691a1dfa3f0e707406a

Entrypoint Preview

Instruction

```
push 00401FDCh
call 00007F07287FA3D5h
add byte ptr [eax], al
add byte ptr [eax], al
add byte ptr [eax], al
xor byte ptr [eax], al
add byte ptr [eax], al
inc eax
add byte ptr [eax], al
add byte ptr [eax], al
add byte ptr [eax], al
add byte ptr [edx+ebx*2-5063138Ah], bl
sub eax, 012EBD42h
jc 00007F07287FA37Eh
adc eax, 00008660h
add byte ptr [eax], al
add byte ptr [eax], al
add dword ptr [eax], eax
add byte ptr [eax], al
inc ecx
add byte ptr [esi+50018250h], al
jc 00007F07287FA451h
push 00000065h
arpl word ptr [ecx+esi+00h], si
add byte ptr [eax], al
add byte ptr [ecx+edi+1Ah], al
add eax, dword ptr [eax]
add byte ptr [eax], al
add bh, bh
```

Instruction
int3
xor dword ptr [eax], eax
add al, 3Fh
bound ebx, dword ptr [edi+79h]
and byte ptr [ebx-6Fh], ch
inc esp
cdq
mov ss, word ptr [eax-75A5582Ah]
or edi, dword ptr [edi]
int3
fcmovnbe st(0), st(1)
sahf
inc ecx
xchg byte ptr [ecx-67h], al
jmp far 9524h : 9EC42827h
cmp cl, byte ptr [edi-53h]
xor ebx, dword ptr [ecx-48EE309Ah]
or al, 00h
stosb
add byte ptr [eax-2Dh], ah
xchg eax, ebx
add byte ptr [eax], al
xlatb
or eax, dword ptr [eax]
add byte ptr [ebx], bh
or eax, dword ptr [eax]
add byte ptr [eax], al
push es
add byte ptr [ebp+edx*2+4Eh], al
dec esi
inc ebp
push edx
add byte ptr [55000A01h], cl
dec esi
push ebx
push ebp
inc esi
inc esi
push ebp
push ebx

Data Directories

Name	Virtual Address	Virtual Size	Is in Section
IMAGE_DIRECTORY_ENTRY_EXPORT	0x0	0x0	
IMAGE_DIRECTORY_ENTRY_IMPORT	0xe9f4	0x28	.text
IMAGE_DIRECTORY_ENTRY_RESOURCE	0x11000	0x940	.rsrc

Name	Virtual Address	Virtual Size	Is in Section
IMAGE_DIRECTORY_ENTRY_EXCEPTION	0x0	0x0	
IMAGE_DIRECTORY_ENTRY_SECURITY	0x0	0x0	
IMAGE_DIRECTORY_ENTRY_BASERELLOC	0x0	0x0	
IMAGE_DIRECTORY_ENTRY_DEBUG	0x0	0x0	
IMAGE_DIRECTORY_ENTRY_COPYRIGHT	0x0	0x0	
IMAGE_DIRECTORY_ENTRY_GLOBALPTR	0x0	0x0	
IMAGE_DIRECTORY_ENTRY_TLS	0x0	0x0	
IMAGE_DIRECTORY_ENTRY_LOAD_CONFIG	0x0	0x0	
IMAGE_DIRECTORY_ENTRY_BOUND_IMPORT	0x228	0x20	
IMAGE_DIRECTORY_ENTRY_IAT	0x1000	0xfc	.text
IMAGE_DIRECTORY_ENTRY_DELAY_IMPORT	0x0	0x0	
IMAGE_DIRECTORY_ENTRY_COM_DESCRIPTOR	0x0	0x0	
IMAGE_DIRECTORY_ENTRY_RESERVED	0x0	0x0	

Sections

Name	Virtual Address	Virtual Size	Raw Size	Xored PE	ZLIB Complexity	File Type	Entropy	Characteristics
.text	0x1000	0xde48	0xe000	False	0.527901785714	data	6.37787982544	IMAGE_SCN_MEM_EXECUTE, IMAGE_SCN_CNT_CODE, IMAGE_SCN_MEM_READ
.data	0xf000	0x1180	0x1000	False	0.00634765625	data	0.0	IMAGE_SCN_CNT_INITIALIZED_DATA, IMAGE_SCN_MEM_WRITE, IMAGE_SCN_MEM_READ
.rsrc	0x11000	0x940	0x1000	False	0.141357421875	data	1.44166791875	IMAGE_SCN_CNT_INITIALIZED_DATA, IMAGE_SCN_MEM_READ

Resources

Name	RVA	Size	Type	Language	Country
RT_ICON	0x113d8	0x568	GLS_BINARY_LSB_FIRST		
RT_GROUP_ICON	0x113c4	0x14	data		
RT_VERSION	0x110f0	0x2d4	data	Chinese	Taiwan

Imports

DLL	Import
MSVBVM60.DLL	_Clcos, _adj_fptan, __vbaFreeVar, __vbaLenBstr, __vbaEnd, __vbaFreeVarList, _adj_fdiv_m64, __vbaFreeObjList, _adj_fprem1, __vbaStrCat, __vbaResultCheckObj, _adj_fdiv_m32, __vbaVarForInit, __vbaObjSet, _adj_fdiv_m16i, _adj_fdivr_m16i, __vbaVarTstLt, __vbaFpR8, _CIsin, __vbaChkstk, EVENT_SINK_AddRef, __vbaStrCmp, _adj_fptan, __vbaLateIdCallId, EVENT_SINK_Release, _CIsqrt, EVENT_SINK_QueryInterface, __vbaExceptHandler, _adj_fprem, _adj_fdivr_m64, __vbaFPException, _Cilog, __vbaNew2, _adj_fdiv_m32i, _adj_fdivr_m32i, __vbaStrCopy, __vbaFreeStrList, _adj_fdivr_m32, _adj_fdiv_r, __vba4Var, __vbaVarDup, __vbaFpI4, _Clatan, __vbaCastObj, __vbaStrMove, _allmul, _Ctan, __vbaVarForNext, _Clexp, __vbaFreeStr, __vbaFreeObj

Version Infos

Description	Data
Translation	0x0404 0x04b0
LegalCopyright	Calc Theory
InternalName	AAKANDEVAND
FileVersion	1.00
CompanyName	Calc Theory
Comments	Calc Theory
ProductName	Calc Theory
ProductVersion	1.00
FileDescription	Calc Theory
OriginalFilename	AAKANDEVAND.exe

Possible Origin

Language of compilation system	Country where language is spoken	Map
Chinese	Taiwan	

Network Behavior

No network behavior found

Code Manipulations

Statistics

System Behavior

Analysis Process: AAKANDEVAND.exe PID: 6676 Parent PID: 5640

General

Start time:	13:02:26
Start date:	22/01/2021
Path:	C:\Users\user\Desktop\AAKANDEVAND.exe
Wow64 process (32bit):	true
Commandline:	'C:\Users\user\Desktop\AAKANDEVAND.exe'
Imagebase:	0x400000
File size:	69632 bytes
MD5 hash:	2C36DCD4149F0AC440632B7FEFB30415
Has elevated privileges:	true
Has administrator privileges:	true
Programmed in:	Visual Basic
Reputation:	low

File Activities

File Path	Access	Attributes	Options	Completion	Source Count	Address	Symbol

Disassembly

Code Analysis