SOAR Content Package for URLScan.io

Description

This content package contains a single resource file with the following rule and workflow:

- 1. URLScan.io Hits (Rule)
- Automatic rule invoked by an artifact of type URL or URL Referer
- · Associated with the URLScan.io Workflow
- 2. URLScan.io Hits (Workflow)
- Queries URLScan.io to determine if a URL is malicious
- Uses the Function Scan with urlscan.io

Package Dependences

The workflows in this package depend on the following

- SOAR Version 43
- fn_urlscan.io Version 1.1.5

Prerequisite

This package requires the URLScan.io integration to be downloaded from the app exchange and installed.

Install

- To install or uninstall an App or Integration on the SOAR platform, see the documentation at ibm.biz/soar-docs.
- To install or uninstall an App on IBM Cloud Pak for Security, see the documentation at ibm.biz/cp4sdocs and follow the instructions above to navigate to Orchestration and Automation.

Import

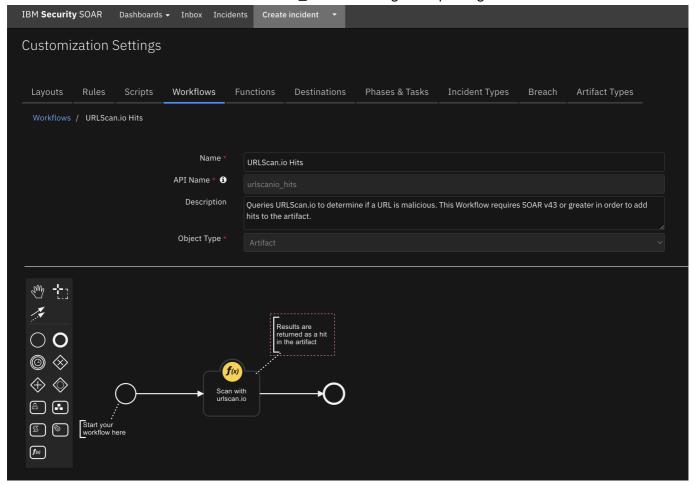
Ensure that the above packages have been installed. Download the res_urlscanio package and unzip it. In SOAR server, go to Administrator Settings->Organization->Migrate Settings->Import->Import Settings and select the urlscanio.res file downloaded above.

Usage

Once the resource file is successfully imported, the workflows included in the file are ready for use.

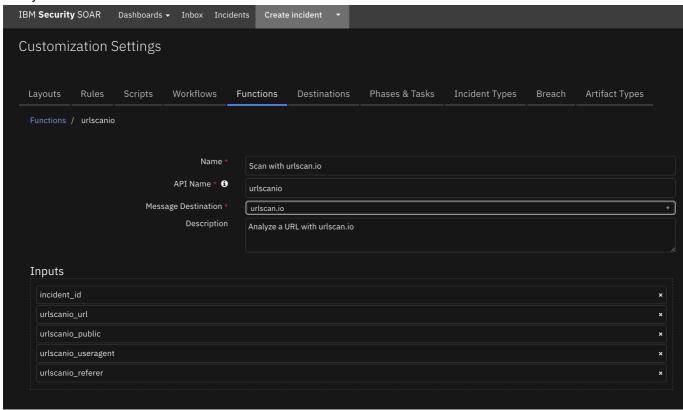
Example of URLScan.io Workflow with Hits

This workflow invokes the funciton from the fn_urlscanio integration packages.



Function - Scan with urlscan.io

Analyze a URL with urlscan.io



► Inputs:

Name	Type	Required	Example	Tooltip
incident_id	number	Yes	-	the id of the incident
urlscanio_url	text	No	-	-
urlscanio_public	boolean	No	-	Should the scan be posted as public?
urlscanio_useragent	text	No	-	Override User-Agent for this scan
urlscanio_referer	text	No	-	Custom referer URL for this scan

► Outputs:

NOTE: This example might be in JSON format, but **results** is a Python Dictionary on the SOAR platform.

```
Result: {
  'png_base64content':
"b'iVBORw0KGqoAAAANSUhEUqAABkAAAASwCAMAAACU33alAAAABGdBTUEAALGPC/xhBQAAAAF
zUkdCAK70H0kAAAMAUExURUNDQ2qoT+/v7/Pz82+o3EqG6AAAAP///+7u7v8AAE50TktLS0hIS
FZWVnZ2dlhYW03t7fHx8f/+/vz8/Pf390ZGRvT09EREREVFRVlZWfDw8Pv7+5+fn+vr683NzZS
UlE1NTeLi4urg6vPy8pkAAImJif3+/icnJ3l5eWtra5KRkgoKClNTU3Kr3snJyW6n3GlgaSsrK
5ycnPPt7fn6+RISEsLCwmFhYfj4+Q40DouLi6KiomdnZ0lJSdXV1YMQE0Dq4Jqamt7e3s/Pzqc
HB1tbW/Pw8AMDA4CAg0zs7KysrF1dXVBQULW0tY+Pj3Nzc29vb66ursDAwPb29uXl5Y0Dg42Nj
bi4uKqqqh4eHmNjY09PT2ml235+faXG59HR0V9fX8vLyxcXF25tbuTk5HFxcqWlpYFDQiIiIuj
o6Nzc3JeXl7e3t6ioqDU1NdfX13t7e1pYWIZBQfsCAtTU1ERBQTIyMjc3N4eHh8XFxS8vL7m5u
dbW1hsbG2mmT70zs1gyMkqE5P8EBMwAAGIqKrEAAI0ICLu7u80AA0UAAJUCAv4AA0QAAD8/P2u
sT1dhddra2tjY2FxnWDk50Xd3e0bm5rq6usfHx7CwsGSlRzw8PL6+vrGxsWCjQfTp6Zs1Nf4QE
P8dHYSEhEmI76+vr/8lJUCB6HGs4ftmZucPDaampmVlZWinTPfMzPtTU6wtKvjd3by8vP4vL/m
amv1JSfxbW/mKivqoqExxpT1Wd9vo9vi6uvbV1Ts704y44vfDw1+g2VqDSa70op0+gftubqTIl
vmSkv0/P/13d5exwPmVlWmfznWx6P/29oK1bWGTwNrp1XWvXfyiol9rWlafMjF75+Df30ry5lR
vf/b59PuDq6fB81qMsUZkiu3z/ZGy8HWh7brVr20aTEZ1wviwsDNMZPD27c/iy0Pu31u06iI0R
FhvTkaI8lFzQsXcvcXW97fN9dHf+ebt+2l0TUxhdmCNTLGup8skHm0iIp6akubl5pIFBbu3sNX
T1r0xrYwJCWYP364AACAASURBVHja7J3tTxPLHseJJDNG5CoBKhw4YiXuapcQS1hwFUyBmgKic
Dg+UIhBViTFYuWFttBjc1/6ikQChBPxlbmv4JV/...",
  'png_url': 'https://urlscan.io/screenshots/799d84f0-3265-4b7e-b34e-
4216409aca4c.png',
  'report_url': 'https://urlscan.io/api/v1/result/799d84f0-3265-4b7e-b34e-
4216409aca4c/',
  'report': {
    'data': {
      'requests': [
          'request': {
            'requestId': 'E0F67B258A2C9D926FC8282F5C2A8C39',
            'loaderId': 'E0F67B258A2C9D926FC8282F5C2A8C39',
            'documentURL':
'https://testsafebrowsing.appspot.com/s/phishing.html',
            'request': {
              'url':
'https://testsafebrowsing.appspot.com/s/phishing.html',
              'method': 'GET',
```

```
'headers': {
                'Upgrade-Insecure-Requests': '1',
                'User-Agent': 'Mozilla/5.0 (Windows NT 10.0; Win64; x64)
AppleWebKit/537.36 (KHTML, like Gecko) Chrome/101.0.4951.41
Safari/537.36',
                'accept-language': 'de-DE,de;g=0.9'
              },
              'mixedContentType': 'none',
              'initialPriority': 'VeryHigh',
              'referrerPolicy': 'strict-origin-when-cross-origin',
              'isSameSite': True
            },
            'timestamp': 1070258.97583,
            'wallTime': 1651691640.447689,
            'initiator': {
              'type': 'other'
            },
            'redirectHasExtraInfo': False,
            'type': 'Document',
            'frameId': '302FBEA868FDEFA5C8C1DA79B3F98E32',
            'hasUserGesture': False,
            'primaryRequest': True
          },
          'response': {
            'encodedDataLength': 785,
            'dataLength': 950,
            'requestId': 'E0F67B258A2C9D926FC8282F5C2A8C39',
            'type': 'Document',
            'response': {
              'url':
'https://testsafebrowsing.appspot.com/s/phishing.html',
              'status': 200,
              'statusText': '',
              'headers': {
                'age': '237',
                'alt-svc': 'h3=":443"; ma=2592000,h3-29=":443";
ma=2592000,h3-Q050=":443"; ma=2592000,h3-Q046=":443"; ma=2592000,h3-
Q043=":443"; ma=2592000, quic=":443"; ma=2592000; v="46,43",
                'cache-control': 'public, max-age=600',
                'content-encoding': 'gzip',
                'content-length': '474',
                'content-type': 'text/html',
                'date': 'Wed, 04 May 2022 19:10:03 GMT',
                'etag': '"8cmb00"',
                'expires': 'Wed, 04 May 2022 19:20:03 GMT',
                'server': 'Google Frontend',
                'x-cloud-trace-context':
'e9a5b16c2c36044270784bef3bf89a13'
              },
              'mimeType': 'text/html',
              'remoteIPAddress': '[2a00:1450:4001:809::2014]',
              'remotePort': 443,
              'encodedDataLength': 302,
              'timing': {
```

```
'requestTime': 1070258.97645,
  'proxyStart': -1,
  'proxyEnd': -1,
  'dnsStart': 0.225,
  'dnsEnd': 22.015,
  'connectStart': 22.015,
  'connectEnd': 43.717,
  'sslStart': 27.921,
  'sslEnd': 43.712.
  'workerStart': -1,
  'workerReady': −1,
  'workerFetchStart': -1,
  'workerRespondWithSettled': -1,
  'sendStart': 43.804,
  'sendEnd': 43.858,
  'pushStart': 0,
  'pushEnd': 0,
  'receiveHeadersEnd': 52.069
},
'responseTime': 1651691640500.288,
'protocol': 'h2',
'securityState': 'secure',
'securityDetails': {
  'protocol': 'TLS 1.3',
  'keyExchange': '',
  'keyExchangeGroup': 'X25519',
  'cipher': 'AES_128_GCM',
  'certificateId': 0,
  'subjectName': '*.appspot.com',
  'sanList': [
    '*.appspot.com',
    'appspot.com',
    '*.de.r.appspot.com',
    '*.df.r.appspot.com',
    '*.an.r.appspot.com',
    '*.dt.r.appspot.com',
    '*.du.r.appspot.com',
    '*.el.r.appspot.com',
    '*.as.r.appspot.com',
    '*.et.r.appspot.com',
    '*.ts.r.appspot.com',
    '*.lz.r.appspot.com',
    '*.ew.r.appspot.com',
    '*.nw.r.appspot.com',
    '*.ey.r.appspot.com',
    '*.ez.r.appspot.com',
    '*.nz.r.appspot.com',
    '*.oa.r.appspot.com',
    '*.nn.r.appspot.com',
    '*.rj.r.appspot.com',
    '*.uc.r.appspot.com',
    '*.tz.r.appspot.com',
    '*.ue.r.appspot.com',
    '*.uk.r.appspot.com',
```

```
'*.uw.r.appspot.com',
                  '*.wl.r.appspot.com',
                  '*.wm.r.appspot.com',
                  '*.wn.r.appspot.com',
                  '*.lm.r.appspot.com',
                  '*.em.r.appspot.com',
                  '*.km.r.appspot.com',
                  '*.pd.r.appspot.com',
                  '*.ui.r.appspot.com',
                  'thinkwithgoogle.com',
                  '*.thinkwithgoogle.com',
                  'thinkwithgoogle.goog',
                  '*.thinkwithgoogle.goog',
                  'withgoogle.com',
                  '*.withgoogle.com',
                  'api.projectshield.withgoogle.com',
                  'withyoutube.com',
                  '*.withyoutube.com',
                  'app.google',
                  '*.app.google'
                ],
                'issuer': 'GTS CA 1C3',
                'validFrom': 1649664993,
                'validTo': 1656922592,
                'signedCertificateTimestampList': [
                ],
                'certificateTransparencyCompliance': 'unknown'
              }
            },
            'hasExtraInfo': True,
            'hash':
'41b42b9c2dc99253ea8de9509413cc634de748bae8e5b2ad3080db58991d0971',
            'size': 950,
            'asn': {
              'ip': '2a00:1450:4001:809::2014',
              'asn': '15169',
              'country': 'US',
              'registrar': 'arin',
              'date': '2000-03-30',
              'description': 'GOOGLE, US',
              'route': '2a00:1450:4001::/48',
              'name': 'GOOGLE'
            },
            'geoip': {
              'country': 'DE',
              'region': 'HE',
              'timezone': 'Europe/Berlin',
              'city': 'Frankfurt am Main',
              '11': [
                50.1188.
                8.6843
              ],
              'country_name': 'Germany',
```

```
'metro': 0
            }
          }
        },
          'request': {
            'requestId': '3340.2',
            'loaderId': 'E0F67B258A2C9D926FC8282F5C2A8C39',
            'documentURL':
'https://testsafebrowsing.appspot.com/s/phishing.html',
            'request': {
              'url': 'https://testsafebrowsing.appspot.com/s/social-
engineering-ad1.png?&/adservices.',
              'method': 'GET',
              'headers': {
                'accept-language': 'de-DE, de; q=0.9',
                'Referer':
'https://testsafebrowsing.appspot.com/s/phishing.html',
                'User-Agent': 'Mozilla/5.0 (Windows NT 10.0; Win64; x64)
AppleWebKit/537.36 (KHTML, like Gecko) Chrome/101.0.4951.41 Safari/537.36'
              'mixedContentType': 'none',
              'initialPriority': 'Low',
              'referrerPolicy': 'strict-origin-when-cross-origin',
              'isSameSite': True
            },
            'timestamp': 1070259.046258,
            'wallTime': 1651691640.518149,
            'initiator': {
              'type': 'parser',
              'url':
'https://testsafebrowsing.appspot.com/s/phishing.html',
              'lineNumber': 9,
              'columnNumber': 56
            },
            'redirectHasExtraInfo': False,
            'type': 'Image',
            'frameId': '302FBEA868FDEFA5C8C1DA79B3F98E32',
            'hasUserGesture': False
          },
          'response': {
            'encodedDataLength': 20888,
            'dataLength': 20761,
            'requestId': '3340.2',
            'type': 'Image',
            'response': {
              'url': 'https://testsafebrowsing.appspot.com/s/social-
engineering-ad1.png?&/adservices.',
              'status': 200,
              'statusText': '',
              'headers': {
                'date': 'Wed, 04 May 2022 19:05:50 GMT',
                'server': 'Google Frontend',
                'age': '490',
```

```
'etag': '"8cmb00"',
                'content-type': 'image/png',
                'x-cloud-trace-context':
'c57b14f911e20ef253dd822c05443f52',
                'cache-control': 'public, max-age=600',
                'alt-svc': 'h3=":443"; ma=2592000,h3-29=":443";
ma=2592000,h3-Q050=":443"; ma=2592000,h3-Q046=":443"; ma=2592000,h3-
Q043=":443"; ma=2592000, quic=":443"; ma=2592000; v="46,43",
                'content-length': '20761',
                'expires': 'Wed, 04 May 2022 19:15:50 GMT'
              },
              'mimeType': 'image/png',
              'remoteIPAddress': '[2a00:1450:4001:809::2014]',
              'remotePort': 443,
              'encodedDataLength': 109,
              'timing': {
                'requestTime': 1070259.046557,
                'proxyStart': -1,
                'proxyEnd': -1,
                'dnsStart': -1,
                'dnsEnd': -1,
                'connectStart': −1,
                'connectEnd': −1,
                'sslStart': -1,
                'sslEnd': -1,
                'workerStart': -1,
                'workerReady': −1,
                'workerFetchStart': -1,
                'workerRespondWithSettled': -1,
                'sendStart': 0.648,
                'sendEnd': 0.912,
                'pushStart': 0,
                'pushEnd': 0,
                'receiveHeadersEnd': 8.506
              },
              'responseTime': 1651691640526.833,
              'protocol': 'h2',
              'securityState': 'secure',
              'securityDetails': {
                'protocol': 'TLS 1.3',
                'keyExchange': '',
                'keyExchangeGroup': 'X25519',
                'cipher': 'AES_128_GCM',
                'certificateId': 0,
                'subjectName': '*.appspot.com',
                'sanList': [
                  '*.appspot.com',
                  'appspot.com',
                  '*.de.r.appspot.com',
                  '*.df.r.appspot.com',
                  '*.an.r.appspot.com',
                  '*.dt.r.appspot.com',
                  '*.du.r.appspot.com',
                  '*.el.r.appspot.com',
```

```
'*.as.r.appspot.com',
                  '*.et.r.appspot.com',
                  '*.ts.r.appspot.com',
                  '*.lz.r.appspot.com',
                  '*.ew.r.appspot.com',
                  '*.nw.r.appspot.com',
                  '*.ey.r.appspot.com',
                  '*.ez.r.appspot.com',
                  '*.nz.r.appspot.com',
                  '*.oa.r.appspot.com',
                  '*.nn.r.appspot.com',
                  '*.rj.r.appspot.com',
                  '*.uc.r.appspot.com',
                  '*.tz.r.appspot.com',
                  '*.ue.r.appspot.com',
                  '*.uk.r.appspot.com',
                  '*.uw.r.appspot.com',
                  '*.wl.r.appspot.com',
                  '*.wm.r.appspot.com',
                  '*.wn.r.appspot.com',
                  '*.lm.r.appspot.com',
                  '*.em.r.appspot.com',
                  '*.km.r.appspot.com',
                  '*.pd.r.appspot.com',
                  '*.ui.r.appspot.com',
                  'thinkwithgoogle.com',
                  '*.thinkwithgoogle.com',
                  'thinkwithgoogle.goog',
                  '*.thinkwithgoogle.goog',
                  'withgoogle.com',
                  '*.withgoogle.com',
                  'api.projectshield.withgoogle.com',
                  'withyoutube.com',
                  '*.withyoutube.com',
                  'app.google',
                  '*.app.google'
                ],
                'issuer': 'GTS CA 1C3',
                'validFrom': 1649664993,
                'validTo': 1656922592,
                'signedCertificateTimestampList': [
                'certificateTransparencyCompliance': 'unknown'
              }
            },
            'hasExtraInfo': True,
            'hash':
'f70c369a77320d54c042f0c632ee29c69c1f11899c4d5fe20b4cfaeda89d21ac',
            'size': 27684,
            'asn': {
              'ip': '2a00:1450:4001:809::2014',
              'asn': '15169',
              'country': 'US',
```

```
'registrar': 'arin',
              'date': '2000-03-30',
              'description': 'GOOGLE, US',
              'route': '2a00:1450:4001::/48',
              'name': 'GOOGLE'
            },
            'geoip': {
              'country': 'DE',
              'region': 'HE',
              'timezone': 'Europe/Berlin',
              'city': 'Frankfurt am Main',
              '11': [
                50.1188,
                8.6843
              ],
              'country_name': 'Germany',
              'metro': 0
            }
          },
          'initiatorInfo': {
            'url': 'https://testsafebrowsing.appspot.com/s/phishing.html',
            'host': 'testsafebrowsing.appspot.com',
            'type': 'parser'
          }
        },
          'request': {
            'requestId': '3340.3',
            'loaderId': 'E0F67B258A2C9D926FC8282F5C2A8C39',
            'documentURL':
'https://testsafebrowsing.appspot.com/s/phishing.html',
            'request': {
              'url': 'https://testsafebrowsing.appspot.com/s/social-
engineering-ad2.png?&/adservices.',
              'method': 'GET',
              'headers': {
                 'accept-language': 'de-DE, de; q=0.9',
                'Referer':
'https://testsafebrowsing.appspot.com/s/phishing.html',
                'User-Agent': 'Mozilla/5.0 (Windows NT 10.0; Win64; x64)
AppleWebKit/537.36 (KHTML, like Gecko) Chrome/101.0.4951.41 Safari/537.36'
              },
              'mixedContentType': 'none',
              'initialPriority': 'Low',
              'referrerPolicy': 'strict-origin-when-cross-origin',
              'isSameSite': True
            },
            'timestamp': 1070259.046452,
            'wallTime': 1651691640.518317,
            'initiator': {
              'type': 'parser',
              'url':
'https://testsafebrowsing.appspot.com/s/phishing.html',
              'lineNumber': 11,
```

```
'columnNumber': 56
            },
            'redirectHasExtraInfo': False,
            'type': 'Image',
            'frameId': '302FBEA868FDEFA5C8C1DA79B3F98E32',
            'hasUserGesture': False
          },
          'response': {
            'encodedDataLength': 50246,
            'dataLength': 50136,
            'requestId': '3340.3',
            'type': 'Image',
            'response': {
              'url': 'https://testsafebrowsing.appspot.com/s/social-
engineering-ad2.png?&/adservices.',
              'status': 200,
              'statusText': '',
              'headers': {
                'date': 'Wed, 04 May 2022 19:05:50 GMT',
                'server': 'Google Frontend',
                'age': '490',
                'etag': '"8cmb00"',
                'content-type': 'image/png',
                'x-cloud-trace-context':
'ef8a52755cab287bdc95ade169daffb3',
                'cache-control': 'public, max-age=600',
                'alt-svc': 'h3=":443"; ma=2592000,h3-29=":443";
ma=2592000,h3-Q050=":443"; ma=2592000,h3-Q046=":443"; ma=2592000,h3-
Q043=":443"; ma=2592000, quic=":443"; ma=2592000; v="46,43",
                'content-length': '50136',
                'expires': 'Wed, 04 May 2022 19:15:50 GMT'
              },
              'mimeType': 'image/png',
              'remoteIPAddress': '[2a00:1450:4001:809::2014]',
              'remotePort': 443,
              'encodedDataLength': 74,
              'timing': {
                'requestTime': 1070259.047135,
                'proxyStart': -1,
                'proxyEnd': -1,
                'dnsStart': -1,
                'dnsEnd': -1,
                'connectStart': −1,
                'connectEnd': −1,
                'sslStart': -1,
                'sslEnd': -1,
                'workerStart': -1,
                'workerReady': -1,
                'workerFetchStart': -1,
                'workerRespondWithSettled': -1,
                'sendStart': 0.29,
                'sendEnd': 0.382,
                'pushStart': 0,
                'pushEnd': 0,
```

```
'receiveHeadersEnd': 10.663
},
'responseTime': 1651691640529.581,
'protocol': 'h2',
'securityState': 'secure',
'securityDetails': {
  'protocol': 'TLS 1.3',
  'keyExchange': '',
  'keyExchangeGroup': 'X25519',
  'cipher': 'AES_128_GCM',
  'certificateId': 0,
  'subjectName': '*.appspot.com',
  'sanList': [
    '*.appspot.com',
    'appspot.com',
    '*.de.r.appspot.com',
    '*.df.r.appspot.com',
    '*.an.r.appspot.com',
    '*.dt.r.appspot.com',
    '*.du.r.appspot.com',
    '*.el.r.appspot.com',
    '*.as.r.appspot.com',
    '*.et.r.appspot.com',
    '*.ts.r.appspot.com',
    '*.lz.r.appspot.com',
    '*.ew.r.appspot.com',
    '*.nw.r.appspot.com',
    '*.ey.r.appspot.com',
    '*.ez.r.appspot.com',
    '*.nz.r.appspot.com',
    '*.oa.r.appspot.com',
    '*.nn.r.appspot.com',
    '*.rj.r.appspot.com',
    '*.uc.r.appspot.com',
    '*.tz.r.appspot.com',
    '*.ue.r.appspot.com',
    '*.uk.r.appspot.com',
    '*.uw.r.appspot.com',
    '*.wl.r.appspot.com',
    '*.wm.r.appspot.com',
    '*.wn.r.appspot.com',
    '*.lm.r.appspot.com',
    '*.em.r.appspot.com',
    '*.km.r.appspot.com',
    '*.pd.r.appspot.com',
    '*.ui.r.appspot.com',
    'thinkwithgoogle.com',
    '*.thinkwithgoogle.com',
    'thinkwithgoogle.goog',
    '*.thinkwithgoogle.goog',
    'withgoogle.com',
    '*.withgoogle.com',
    'api.projectshield.withgoogle.com',
    'withyoutube.com',
```

```
'*.withyoutube.com',
                  'app.google',
                  '*.app.google'
                ],
                'issuer': 'GTS CA 1C3',
                'validFrom': 1649664993,
                'validTo': 1656922592,
                'signedCertificateTimestampList': [
                'certificateTransparencyCompliance': 'unknown'
              }
            },
            'hasExtraInfo': True,
            'hash':
'825c234b510213d77f2a0b84b690ec541ea7e30178b28274f2231880d21e7fef',
            'size': 66848,
            'asn': {
              'ip': '2a00:1450:4001:809::2014',
              'asn': '15169',
              'country': 'US',
              'registrar': 'arin',
              'date': '2000-03-30',
              'description': 'GOOGLE, US',
              'route': '2a00:1450:4001::/48',
              'name': 'GOOGLE'
            },
            'qeoip': {
              'country': 'DE',
              'region': 'HE',
              'timezone': 'Europe/Berlin',
              'city': 'Frankfurt am Main',
              '11': [
               50.1188.
                8.6843
              ],
              'country_name': 'Germany',
              'metro': 0
            }
          },
          'initiatorInfo': {
            'url': 'https://testsafebrowsing.appspot.com/s/phishing.html',
            'host': 'testsafebrowsing.appspot.com',
            'type': 'parser'
          }
        },
          'request': {
            'requestId': '3340.4',
            'loaderId': 'E0F67B258A2C9D926FC8282F5C2A8C39',
            'documentURL':
'https://testsafebrowsing.appspot.com/s/phishing.html',
            'request': {
              'url': 'https://testsafebrowsing.appspot.com/s/social-
```

```
engineering-ad3.png?&/adservices.',
              'method': 'GET',
              'headers': {
                'accept-language': 'de-DE, de; q=0.9',
                'Referer':
'https://testsafebrowsing.appspot.com/s/phishing.html',
                'User-Agent': 'Mozilla/5.0 (Windows NT 10.0; Win64; x64)
AppleWebKit/537.36 (KHTML, like Gecko) Chrome/101.0.4951.41 Safari/537.36'
              },
              'mixedContentType': 'none',
              'initialPriority': 'Low',
              'referrerPolicy': 'strict-origin-when-cross-origin',
              'isSameSite': True
            },
            'timestamp': 1070259.046564,
            'wallTime': 1651691640.51843,
            'initiator': {
              'type': 'parser',
              'url':
'https://testsafebrowsing.appspot.com/s/phishing.html',
              'lineNumber': 13,
              'columnNumber': 56
            },
            'redirectHasExtraInfo': False,
            'type': 'Image',
            'frameId': '302FBEA868FDEFA5C8C1DA79B3F98E32',
            'hasUserGesture': False
          },
          'response': {
            'encodedDataLength': 6776,
            'dataLength': 6719,
            'requestId': '3340.4',
            'type': 'Image',
            'response': {
              'url': 'https://testsafebrowsing.appspot.com/s/social-
engineering-ad3.png?&/adservices.',
              'status': 200,
              'statusText': '',
              'headers': {
                'date': 'Wed, 04 May 2022 19:05:50 GMT',
                'server': 'Google Frontend',
                'age': '490',
                'etag': '"8cmb00"',
                'content-type': 'image/png',
                'x-cloud-trace-context':
'c57b14f911e20ef253dd822c05443f52',
                'cache-control': 'public, max-age=600',
                'alt-svc': 'h3=":443"; ma=2592000,h3-29=":443";
ma=2592000,h3-Q050=":443"; ma=2592000,h3-Q046=":443"; ma=2592000,h3-
Q043=":443"; ma=2592000, quic=":443"; ma=2592000; v="46,43"',
                'content-length': '6719',
                'expires': 'Wed, 04 May 2022 19:15:50 GMT'
              },
              'mimeType': 'image/png',
```

```
'remoteIPAddress': '[2a00:1450:4001:809::2014]',
'remotePort': 443,
'encodedDataLength': 48,
'timing': {
  'requestTime': 1070259.047342,
  'proxyStart': -1,
  'proxyEnd': -1,
  'dnsStart': −1,
  'dnsEnd': -1,
  'connectStart': −1,
  'connectEnd': −1,
  'sslStart': −1,
  'sslEnd': −1,
  'workerStart': -1,
  'workerReady': -1,
  'workerFetchStart': -1,
  'workerRespondWithSettled': -1,
  'sendStart': 0.157,
  'sendEnd': 0.191,
  'pushStart': 0,
  'pushEnd': 0,
  'receiveHeadersEnd': 17.052
},
'responseTime': 1651691640536.175,
'protocol': 'h2',
'securityState': 'secure',
'securityDetails': {
  'protocol': 'TLS 1.3',
  'keyExchange': '',
  'keyExchangeGroup': 'X25519',
  'cipher': 'AES_128_GCM',
  'certificateId': 0,
  'subjectName': '*.appspot.com',
  'sanList': [
    '*.appspot.com',
    'appspot.com',
    '*.de.r.appspot.com',
    '*.df.r.appspot.com',
    '*.an.r.appspot.com',
    '*.dt.r.appspot.com',
    '*.du.r.appspot.com',
    '*.el.r.appspot.com',
    '*.as.r.appspot.com',
    '*.et.r.appspot.com',
    '*.ts.r.appspot.com',
    '*.lz.r.appspot.com',
    '*.ew.r.appspot.com',
    '*.nw.r.appspot.com',
    '*.ey.r.appspot.com',
    '*.ez.r.appspot.com',
    '*.nz.r.appspot.com',
    '*.oa.r.appspot.com',
    '*.nn.r.appspot.com',
    '*.rj.r.appspot.com',
```

```
'*.uc.r.appspot.com',
                  '*.tz.r.appspot.com',
                  '*.ue.r.appspot.com',
                  '*.uk.r.appspot.com',
                  '*.uw.r.appspot.com',
                  '*.wl.r.appspot.com',
                  '*.wm.r.appspot.com',
                  '*.wn.r.appspot.com',
                  '*.lm.r.appspot.com',
                  '*.em.r.appspot.com',
                  '*.km.r.appspot.com',
                  '*.pd.r.appspot.com',
                  '*.ui.r.appspot.com',
                  'thinkwithgoogle.com',
                  '*.thinkwithgoogle.com',
                  'thinkwithgoogle.goog',
                  '*.thinkwithgoogle.goog',
                  'withgoogle.com',
                  '*.withgoogle.com',
                  'api.projectshield.withgoogle.com',
                  'withyoutube.com',
                  '*.withyoutube.com',
                  'app.google',
                  '*.app.google'
                ],
                'issuer': 'GTS CA 1C3',
                'validFrom': 1649664993,
                'validTo': 1656922592,
                'signedCertificateTimestampList': [
                ],
                'certificateTransparencyCompliance': 'unknown'
            },
            'hasExtraInfo': True,
            'hash':
'01f490cbdc7f84ccd0fc6ade0a645910152e8053d67a49402fd789c9146ca2a2',
            'size': 8960,
            'asn': {
              'ip': '2a00:1450:4001:809::2014',
              'asn': '15169',
              'country': 'US',
              'registrar': 'arin',
              'date': '2000-03-30',
              'description': 'GOOGLE, US',
              'route': '2a00:1450:4001::/48',
              'name': 'GOOGLE'
            },
            'geoip': {
              'country': 'DE',
              'region': 'HE',
              'timezone': 'Europe/Berlin',
              'city': 'Frankfurt am Main',
              '11': [
```

```
50.1188,
            8.6843
          ],
          'country_name': 'Germany',
          'metro': 0
        }
      },
      'initiatorInfo': {
        'url': 'https://testsafebrowsing.appspot.com/s/phishing.html',
        'host': 'testsafebrowsing.appspot.com',
        'type': 'parser'
      }
    }
  ],
  'cookies': [
  ],
  'console': [
  ],
  'links': [
  ],
  'timing': {
    'beginNavigation': '2022-05-04T19:14:00.445Z',
    'frameStartedLoading': '2022-05-04T19:14:00.502Z',
    'frameNavigated': '2022-05-04T19:14:00.517Z',
    'domContentEventFired': '2022-05-04T19:14:00.521Z',
    'frameStoppedLoading': '2022-05-04T19:14:00.539Z'
  },
  'qlobals': [
      'prop': 'oncontextlost',
      'type': 'object'
    },
      'prop': 'oncontextrestored',
      'type': 'object'
    },
      'prop': 'structuredClone',
      'type': 'function'
    },
      'prop': 'getScreenDetails',
      'type': 'function'
 ]
},
'stats': {
  'resourceStats': [
      'count': 3,
      'size': 77616,
```

```
'encodedSize': 77910,
    'latency': 0,
    'countries': [
      'DE'
    ],
    'ips': [
      '[2a00:1450:4001:809::2014]'
    'type': 'Image',
    'compression': '1.0',
    'percentage': 75
  },
    'count': 1,
    'size': 950,
    'encodedSize': 785,
    'latency': 0,
    'countries': [
      'DE'
    ],
    'ips': [
      '[2a00:1450:4001:809::2014]'
    ],
    'type': 'Document',
    'compression': '1.2',
    'percentage': 25
  }
],
'protocolStats': [
  {
    'count': 4,
    'size': 78566,
    'encodedSize': 78695,
    'ips': [
      '[2a00:1450:4001:809::2014]'
    ],
    'countries': [
      'DE'
    ],
    'securityState': {
    },
    'protocol': 'h2'
  }
],
'tlsStats': [
    'count': 4,
    'size': 78566,
    'encodedSize': 78695,
    'ips': [
      '[2a00:1450:4001:809::2014]'
    ],
    'countries': [
```

```
'DE'
    ],
    'protocols': {
      'TLS 1.3 / / AES_128_GCM': 4
    'securityState': 'secure'
  }
],
'serverStats': [
  {
    'count': 4,
    'size': 78566,
    'encodedSize': 78695,
    'ips': [
      '[2a00:1450:4001:809::2014]'
    'countries': [
      'DE'
    ],
    'server': 'Google Frontend'
  }
],
'domainStats': [
  {
    'count': 4,
    'ips': [
      '2a00:1450:4001:809::2014',
      '[2a00:1450:4001:809::2014]'
    ],
    'domain': 'testsafebrowsing.appspot.com',
    'size': 78566,
    'encodedSize': 78695,
    'countries': [
      'DE'
    ],
    'index': 0,
    'initiators': [
      'testsafebrowsing.appspot.com'
    ],
    'redirects': 0
  }
'regDomainStats': [
    'count': 4,
    'ips': [
      '2a00:1450:4001:809::2014',
      '[2a00:1450:4001:809::2014]'
    'regDomain': 'testsafebrowsing.appspot.com',
    'size': 78566,
    'encodedSize': 78695,
    'countries': [
```

```
'index': 0,
    'subDomains': [
      {
        'domain': '',
        'country': 'DE'
      }
    ],
    'redirects': 0
  }
],
'secureRequests': 4,
'securePercentage': 100,
'IPv6Percentage': 100,
'uniqCountries': 1,
'totalLinks': 0,
'malicious': 0,
'adBlocked': 0,
'ipStats': [
 {
    'requests': 4,
    'domains': [
      'testsafebrowsing.appspot.com'
    'ip': '2a00:1450:4001:809::2014',
    'asn': {
      'ip': '2a00:1450:4001:809::2014',
      'asn': '15169',
      'country': 'US',
      'registrar': 'arin',
      'date': '2000-03-30',
      'description': 'GOOGLE, US',
      'route': '2a00:1450:4001::/48',
      'name': 'GOOGLE'
    },
    'dns': {
    },
    'geoip': {
      'country': 'DE',
      'region': 'HE',
      'timezone': 'Europe/Berlin',
      'city': 'Frankfurt am Main',
      '11': [
        50.1188.
        8.6843
      ],
      'country_name': 'Germany',
      'metro': 0
    },
    'size': 78566,
    'encodedSize': 78695,
    'countries': [
      'DE'
```

```
'index': 0,
      'ipv6': True,
      'redirects': 0,
      'count': None
    }
  ]
},
'meta': {
  'processors': {
    'umbrella': {
      'data': [
        {
          'hostname': 'testsafebrowsing.appspot.com',
          'rank': 560569
        }
      ]
    },
    'geoip': {
      'data': [
        {
          'ip': '2a00:1450:4001:809::2014',
          'geoip': {
            'country': 'DE',
            'region': 'HE',
            'timezone': 'Europe/Berlin',
            'city': 'Frankfurt am Main',
            '11': [
              50.1188,
              8.6843
            'country_name': 'Germany',
            'metro': 0
          }
        }
      ]
    },
    'rdns': {
      'data': [
     ]
    },
    'asn': {
      'data': [
          'ip': '2a00:1450:4001:809::2014',
          'asn': '15169',
          'country': 'US',
          'registrar': 'arin',
          'date': '2000-03-30',
          'description': 'GOOGLE, US',
          'route': '2a00:1450:4001::/48',
          'name': 'GOOGLE'
        }
```

```
},
        'wappa': {
          'data': [
          1
        }
      }
    },
    'task': {
      'uuid': '799d84f0-3265-4b7e-b34e-4216409aca4c',
      'time': '2022-05-04T19:14:00.367Z',
      'url': 'https://testsafebrowsing.appspot.com/s/phishing.html',
      'visibility': 'private',
      'method': 'api',
      'source': 'd2b788a6',
      'tags': [
      ],
      'reportURL': 'https://urlscan.io/result/799d84f0-3265-4b7e-b34e-
4216409aca4c/',
      'screenshotURL': 'https://urlscan.io/screenshots/799d84f0-3265-4b7e-
b34e-4216409aca4c.png',
      'domURL': 'https://urlscan.io/dom/799d84f0-3265-4b7e-b34e-
4216409aca4c/'
    },
    'page': {
      'url': 'https://testsafebrowsing.appspot.com/s/phishing.html',
      'domain': 'testsafebrowsing.appspot.com',
      'country': 'DE',
      'city': 'Frankfurt am Main',
      'server': 'Google Frontend',
      'ip': '2a00:1450:4001:809::2014',
      'asn': 'AS15169',
      'asnname': 'GOOGLE, US'
    },
    'lists': {
      'ips': [
        '2a00:1450:4001:809::2014'
      ],
      'countries': [
        'DE'
      ],
      'asns': [
        '15169'
      'domains': [
        'testsafebrowsing.appspot.com'
      ],
      'servers': [
        'Google Frontend'
      ],
      'urls': [
        'https://testsafebrowsing.appspot.com/s/phishing.html',
```

```
'https://testsafebrowsing.appspot.com/s/social-engineering-
ad1.png?&/adservices.',
        'https://testsafebrowsing.appspot.com/s/social-engineering-
ad2.png?&/adservices.',
        'https://testsafebrowsing.appspot.com/s/social-engineering-
ad3.png?&/adservices.'
      ],
      'linkDomains': [
      ],
      'certificates': [
          'subjectName': '*.appspot.com',
          'issuer': 'GTS CA 1C3',
          'validFrom': 1649664993,
          'validTo': 1656922592
        }
      ],
      'hashes': [
'41b42b9c2dc99253ea8de9509413cc634de748bae8e5b2ad3080db58991d0971',
'f70c369a77320d54c042f0c632ee29c69c1f11899c4d5fe20b4cfaeda89d21ac',
'825c234b510213d77f2a0b84b690ec541ea7e30178b28274f2231880d21e7fef',
        '01f490cbdc7f84ccd0fc6ade0a645910152e8053d67a49402fd789c9146ca2a2'
      1
    },
    'verdicts': {
      'overall': {
        'score': 100,
        'categories': [
          'phishing'
        ],
        'brands': [
          'testbrand'
        ],
        'tags': [
          'phishing'
        ],
        'malicious': True,
        'hasVerdicts': True
      },
      'urlscan': {
        'score': 100,
        'categories': [
          'phishing'
        ],
        'brands': [
            'key': 'testbrand',
            'name': 'Test Brand',
            'country': [
              'us'
```

```
'vertical': [
              'Online'
            ]
          }
        ],
        'tags': [
         'phishing'
        ],
        'malicious': True,
        'hasVerdicts': True
      },
      'engines': {
        'score': 0,
        'categories': [
        ],
        'enginesTotal': 0,
        'maliciousTotal': 0,
        'benignTotal': 0,
        'maliciousVerdicts': [
        ],
        'benignVerdicts': [
        ],
        'malicious': False,
        'hasVerdicts': False
      },
      'community': {
        'score': 0,
        'categories': [
        ],
        'brands': [
        ],
        'votesTotal': 0,
        'votesMalicious': 0,
        'votesBenign': 0,
        'malicious': False,
        'hasVerdicts': False
     }
    },
    'submitter': {
      'country': 'US'
    }
 }
}
```

- ► Example Pre-Process Script:
- ► Example Post-Process Script:

```
result_data = result_content.get('data', None)
if not result_data:
    return True

result_data_requests_list = result_data.get('requests', None)
if not result_data_requests_list:
    return True

# get first element from the list
requests_first_el = result_data_requests_list[0]
if not requests_first_el:
    return True

response = requests_first_el.get('response', None)
if not response or 'failed' in response:
    return True

return True
```

def prepare_city_country(*argv): """ Prepare a list of non None value or blank "Falsy" parameters. :param *argv - city, country :return: list """ city_country_list = [el for el in argv if el] return city_country_list

if results.png_url is not None: result_content = results.report

stats = result_content.get('stats', None) if stats: verdicts = result_content.get('verdicts', None) urlscan = verdicts.get('urlscan', None) malicious_flag = urlscan.get('malicious', None)

```
if malicious_flag == 1:
      # Some malicious scans show as failed, do not include those
      if not verify_for_scan_failed_flag(result_content):
        task = result_content.get('task', None)
        page = result_content.get('page', None)
        png_url = task.get('screenshotURL', None) if task else None
        scan_time = task.get('time', None) if task else None
        report_url = task.get('reportURL', None) if task else None
        uniq_countries_int = stats.get('uniqCountries', None)
        city_country_list = prepare_city_country(page.get('city', None),
                                                       page.get('country',
None)) if page else None
        city_country = ",".join(city_country_list) if city_country_list
else None
        server = page.get('server', None) if page else None
        asn = page.get('asnname', None) if page else None
        hit = [
            {
```

```
"name": "Time Last Scanner",
      "type": "string",
      "value": "{}".format(scan_time)
    },
    {
      "name": "Number of Countries",
      "type": "number",
      "value": "{}".format(uniq_countries_int)
    },
    {
      "name": "City and Country",
      "type": "string",
      "value": "{}".format(city_country)
    },
      "name": "Server",
      "type": "string",
      "value": "{}".format(server)
    },
      "name": "ASN Name",
      "type": "string",
     "value": "{}".format(asn)
    },
    {
      "name": "Report Link",
      "type": "uri",
      "value": "{}".format(report_url)
    },
      "name": "Screenshot Link",
      "type": "uri",
      "value": "{}".format(png_url)
    }
artifact.addHit("URLScan.io Function hits added", hit)
```

else: LOG.info("No Result information found on URL: {0}".format(result_url))

```
</details>
---

</details>
---

## Uninstall

Manually delete the followings:

1. Rules
- "URLScan.io Hits"
```

- 2. Workflows
- URLScan.io Hits