

### Specifications of contents in attached excels (Tables S1-S5)

Names of attached Excels	Names of sheets in the Excel
Table S1 for Phase 1_News Collection & Cleansing	<ul style="list-style-type: none"> <li>● Corpus collection</li> <li>● Corpus cleansed</li> </ul>
Table S2 for Phase 2 Domain Knowledge Components (5 lists of index words)	<ul style="list-style-type: none"> <li>● Portable water</li> <li>● Saltwater</li> <li>● Road and streets</li> <li>● Buildings (Hong Kong Island &amp; Kowloon)</li> <li>● Buildings (New Territories)</li> <li>● Wastewater &amp; storm water</li> <li>● Electricity</li> <li>● Gas</li> <li>● Telecommunications</li> <li>● Slope protectors</li> <li>● Lifts and escalators</li> <li>● Waste &amp; environment</li> <li>● Hospitals and clinics</li> <li>● Emergency service</li> <li>● Entertainment</li> <li>● Social service</li> <li>● Business stores</li> <li>● Schools</li> <li>● Transit</li> </ul>
Table S3 for Phase 2_Domain Knowledge Components (Hong Kong Dictionary of City Infrastructure)	<ul style="list-style-type: none"> <li>● Potentially affected infrastructures</li> <li>● Synonyms of potentially affected infrastructures</li> <li>● Infrastructure damages</li> <li>● Potentially affected stakeholders</li> <li>● Synonyms of potentially affected infrastructures</li> </ul>
Table S4 for Phase 3&4_Recognized Infrastructure/Stakeholder Entities & Verification	<ul style="list-style-type: none"> <li>● Identified affected infrastructures in 1028 water pipe bursts</li> <li>● Identified affected stakeholders in 1028 water pipe bursts</li> <li>● Summary of verification</li> <li>● Manual results (infrastructures) of 100 samples</li> <li>● Automatic results (infrastructures) of 100 samples</li> <li>● Manual results (Stakeholder) of 100 samples</li> <li>● Automatic results (Stakeholder) of 100 samples</li> </ul>
Table S5 for Phase 5&6_Results of IFI rules & Associated Stakeholders	<ul style="list-style-type: none"> <li>● 15099 potential infrastructure failure association (IFI) rules</li> <li>● 25 Stakeholders' co-occurrence matrix</li> <li>● Evolution of IFI chains</li> </ul>

Note: Due to these sheets are too large, the specific contents have been anonymously uploaded to GitHub open to all researcher, the URL is “<https://github.com/0AnonymousSite0/Delineating-Infrastructure-Failure-Interdependencies-and-Associated-Stakeholders-through-Mining-News>”.