**Supplemental Table 3: High-Risk Housing Code Violations in Chelsea, MA and Rationale for their Selection**

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| **Violation** | **Definition**1 | **Public Health Rationale for Selection** |
| Smoke Detectors and Carbon Monoxide | Owners must provide, install, and maintain in operable conditions smoke and carbon monoxide detectors in every dwelling  *Example infraction:*   * Replace missing smoke detector or batteries | The death rate in homes without functional smoke detectors is twice as high as homes with functional smoke detectors.2 Chelsea has the highest rate of fires in Suffolk County at 12.4 fires per 1 000 people.3 |
| Locks | Owners shall provide, install, and maintain locks so that all dwellings, units, and exterior windows are securable against unlawful entry and prevent entrapment in the building.  *Example infraction:*   * Remove keyed locks from all bedroom doors | While this violation may refer to locks to prevent unlawful entry, in Chelsea, inspectors state that this violation is exclusively used when there are keyed locks on internal room doors barring entry from the outside. This is a strong indicator of overcrowded living conditions and is done when a home is subdivided into many sublet rooms. The City is particularly concerned about the negative social and health consequences of overcrowding, such as poor school performance, intimate partner violence, and higher Covid-19 transmission.4–6 |
| Extermination of Insects, Rodents, and Skunks | Owners and occupants must maintain units free from rodents, skunks, cockroaches and insect infestations.  *Example infraction:*   * Seal all rodent passageways throughout unit | Insects and animal infestations are not only created by deteriorating and unhygienic conditions, but also exacerbate these conditions. Insect or animal infestations can spread infectious disease and trigger asthma attacks.7,8 |
| Maintenance of Areas to be Free from Garbage | Owners of any land parcels must maintain such parcels in clean and sanitary conditions. Occupants must maintain dwelling units in clean, sanitary conditions, free of garbage, rubbish, and other filth or causes of sicknesses.  *Example infraction:*   * Remove debris from rear egress hallway | Uncontained garbage in the home creates unhygienic conditions and may attract infestations of insects or animals. Garbage in living areas may also be an indicator of a resident’s inability to maintain a property, representing a possible behavioral health concern or physical disability.9 |

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