

**TITLE** - Forensic Markers of Elder Abuse

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**SOURCE** - Webinar dated January 12, 2015

## SUMMARY OF RESEARCH

It is a generally accepted fact that older adults bruise more easily than younger adults. This is due to a number of factors, some of which are related to normal age-related changes and others of which are related to health problems and/or their accompanying treatment. With aging the epidermis (outer layer of skin) becomes thinner, capillaries (small bridging vessels between our arteries and veins) become more fragile, and the amount of subcutaneous fat (the layer of fat just under the skin) thins. As a result of these changes, a relatively minor bump that might go unnoticed on a 30 year old can cause a significant bruise on a 90 year old. Further, if this 90 year old has chronic medical problems necessitating certain medications such as prednisone or warfarin they may be even more prone to bruising. When confronted with an elder who is bruised it may therefore be difficult to distinguish if an abusive act was involved. This research showed a few key findings that can help one to differentiate between an innocent and an abusive cause. First, provide a safe environment and ask in a reassuring tone what happened. If the elder provides a history that is incongruent with the bruising, ask more questions such as “did anyone hurt you?” For example, a person with bruising on the neck and buttocks is unlikely to have received these injuries from a fall. Next, look at the location of the bruises: bruises on the head, neck, torso, buttocks, soles of the feet, and upper arm are more likely to be associated with abuse than bruises on the shin, arm below the elbow, and back of the hand. Finally, consider the size and number of bruises. Bruises that are larger than 2 ½ inches and multiple bruises are more likely to be associated with abuse than smaller and fewer bruises. It is important to note that the age of a bruise is difficult to estimate accurately based on its color. The criteria enumerated in this brief are not absolute but do serve as helpful guidelines about when it is more appropriate to accept an initial explanation of “it was an accident” and when to probe a little deeper.

## PRACTICE & POLICY IMPLICATIONS

Understanding the etiology and life cycle of accidental and inflicted bruises in older adults can help health care professionals (including first responders), social service providers and law enforcement officers identify older adults who have been abused. This understanding can also protect caregivers from erroneous accusations. More research is needed from a multidisciplinary perspective to understand bruising in older adults from various racial and ethnic communities. Funding and research are also needed to distinguish other injuries such as fractures and pressure sores that may be due to innocent causes or due to abuse/neglect. Collaboration between universities and agencies that serve older adults is critical to this research, both for the purpose of asking the right research question and for the data collection.

## FURTHER READING

Wiglesworth, A., Austin, R., Corona, M. & Mosqueda, L. (March 2009). *Bruising as a Forensic Marker of Physical Elder Abuse*. Washington, D. C.: U. S. Department of Justice.

Mosqueda, L., Burnight, K & Liao, K. (June 2006). *Bruising in the Geriatric Population*. Washington, D.C.: U.S. Department of Justice.

Mosqueda, L., Burnight, K., & Liao, K. (2005). *The life cycle of bruises in older adults*. *Journal of the American Geriatrics Society*, 53, 8, 1339-1343.



This research summary is part of a series sponsored by the National Adult Protective Services Association (NAPSA) and the National Committee for the Prevention of Elder Abuse (NCPEA) joint Research Committee. The purpose of this research summary is to provide direct access to findings in order to enhance practice and clarify policy choices.

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