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# Mixed Methods Assessment of Pediatric Scald Burns



Pediatric scald burns most commonly occur in child's home under adult supervision. Adults are not confident in their first aid ability and are unable to accurately describe burn severity.

## Population

- Recruited caregivers of pediatric scald burn patients seen at an ABA verified burn center.
- Typical participant was mother (74%) between ages 30-49 years old (68%) with a high school degree or higher (98%).
- Typical child with scald burn was a male (63%) between 0-5 years old at time of the burn\* (63%).

\*As reported in the medical record

### Methods

Population (N=54) Convenience sample of caregivers attending burn follow up clinic with their child (age 9mo-12yr).

**Eligibility Criteria** Child burned by hot liquid or food, burn not associated with suspected physical child abuse.

Caregiver completed 39item iPad-based survey. If permission granted, burn characteristics were collected from medical record.

**Process** 

# Medical Record and Parent Report

	Parent Report (n=41), n (%)	Medical Record (n=41), n (%)
<b>Total Body Surface Area (TBSA)</b>		
TBSA 1-25%	21 (51%)	38 (93%)
TBSA 26-100%	0	0
TBSA unknown	20 (49%)	3 (7%)
Description of Burn Depth/Severity*		
Deep/Full Thickness, Partial/Deep	9 (22%)	4(10%)
Superficial Partial, Superficial, Partial	21 (51%)	35 (85%)
Unknown	11 (27%)	2 (5%)
*Parent responses were collapsed into two	categories	

## Burn Characteristics and First Aid Knowledge

Mechanism an	d Circumstances of Burn	Percent Participants (N=54*)
Location where	e burn occurred	
	Child's Home	80%
	Relative's Home	13%
	Daycare	2%
	Car	4%
If at a home, in which room of the house did the injury occur?		N=50
	Bedroom	4%
	Dining Room	12%
	Kitchen	66%
	Living Room	14%
	Other	4%
Percent reporti	ng child was in their care when injury occurred	70%
Percent reporti	ng they saw the injury occur (N=39)	37%
Percent reporting someone else saw injury occur (N=24)		43%
How did the ho	t liquid spill on the child?	
	Child pulled it onto him/herself	39%
	Child knocked it over	31%
	Child was sitting next to it	6%
	Another person spilled it	6%
	Another person knocked it over	4%
	Other	15%
*Unless otherwi	ise noted	

First Aid Knowledge	Percent Participants (N=54*)
Was first aid applied at the time of the injury?	
Yes	70%
No	30%
At the time of the injury how confident were you in	your
ability to apply first aid to the scald injury?	
Not at all confident	30%
Knew enough to apply basic first aid	44%
Very confident	26%
*unless otherwise noted	

#### **Lessons Learned**

- Most scald burns in this study occurred in the home, specifically in the kitchen, and were caused by the child.
- Many caregivers did not know the severity of their child's burn.
- Education and resources regarding scald burn prevention and first aid must be provided to caregivers.

## **Authors and Affiliations**

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