

**TABLE 3**  
**Causes of hyponatremia and their usual corresponding urine studies and urine output**

Volume status	Etiology	Urine osmolality	Urine sodium	ADH-dependent	Urine output
Hypovolemic	Volume loss (nonrenal)	> 100 mOsm/Kg	< 30 mmol/L	Yes	Decreased
	Cerebral salt wasting	> 100 mOsm/Kg	> 30 mmol/L	Yes	Increased
	Diuretics	> 100 mOsm/Kg	> 30 mmol/L	Yes	Increased
Euvolemic	Syndrome of inappropriate ADH	> 100 mOsm/Kg	> 30 mmol/L	Yes	Decreased
	Low-solute state	< 100 mOsm/Kg <sup>a</sup>	< 30 mmol/L	No	Variable
	Primary polydipsia	< 100 mOsm/Kg	Variable	No	Increased
	Reset osmostat	Variable	Variable	No	Variable
Hypervolemic	Cirrhosis	> 100 mOsm/Kg	< 30 mmol/L	Yes	Decreased
	Heart failure	> 100 mOsm/Kg	< 30 mmol/L	Yes	Decreased
	Kidney failure	> 100 mOsm/Kg	> 30 mmol/L	No	Decreased

<sup>a</sup>The osmolality in a low-solute state can be higher in a concomitant hypovolemic state.

ADH = antidiuretic hormone