

Table 1. Drugs causing alterations in thyroid function and mechanisms involved**Hypothyroidism**

Drugs	thionamides, lithium, perchlorate, aminoglutethimide, thalidomide iodine and iodine-containing drugs • amiodarone, • radiographic agents, • expectorants • potassium iodine solutions • Betadine douches • topical antiseptics	cholestyramine colestipol, aluminum hydroxide, calcium carbonate, sucralfate, iron sulfate, raloxifene, omeprazole, lansoprazole sevelamer lanthanum carbonate	interferon-alpha interleukin-2	dopamine	sunitinib	bexarotene
Mechanism	Inhibition of thyroid hormone synthesis and/or release	Decreased absorption of T4	Immuno-dysregulation	Suppression of TSH	Possible destructive thyroiditis	Increased T4 clearance and suppression of TSH

Hyperthyroidism

Drugs	iodine amiodarone			interferon-alpha interleukin-2		
Mechanism	Stimulation of thyroid hormone synthesis and/or release			Immuno-dysregulation		

Drugs causing abnormal thyroid function tests without thyroid dysfunction

Drugs	androgens, danazol, glucocorticoids, nicotinic acid l-asparaginase	estrogens, tamoxifen, raloxifene, methadone, 5-fluouracil, clofibrate, heroin, mitotane	salicylates salsalate furosemide heparin NSAIDs	phenytoin, carbamazepine, rifampin, phenobarbital	dobutamine, glucocorticoids, octreotide	amiodarone glucocorticoids, contrast agents (e.g., iopanoic acid), propylthiouracil, propranolol
Mechanism	Low serum TBG	High serum TBG	Decreased T4 binding to TBG	Increased T4 clearance	Suppression of TSH secretion	Impaired conversion of T4 to T3