

## Analysis Table

- 17 records/ articles analyzed.
- Below table covers articles (1 to 8), which are talking about inhibition or stimulation of HSL by the chemical compounds.

S.No.	Database/ Accession Number	Focus	Compounds	HSL Activity/ Expression	Function of the compounds	Disease/Disorder (to be treated/ associated with)	Dolcera summary
1	BIOSIS / 2006:234207	Expression of the HSL gene by the PPAR gamma and PPAR gamma agonists (rosiglitazone and pioglitazone) in the cultured hepatic cells and differentiating preadipocytes.	Rosiglitazone	Up-regulation	Rosiglitazone up-regulates the HSL gene in liver and skeleton muscle (from an experimental obese rat model).	Type 2 diabetes	This study is focused on expression of the HSL gene by PPAR gamma and PPAR gamma agonists (rosiglitazone and pioglitazone) in the cultured hepatic cells and differentiating preadipocytes. Rosiglitazone up-regulates the HSL gene. In conclusion, the study suggests that HSL may be a newly identified PPAR gamma target gene, and up-regulation of HSL may be an important mechanism involved in action of PPAR gamma agonists in type 2 diabetes.
2	BIOSIS / 2004:316145	Inhibitors of hormone sensitive lipase.	(5-(2H)-isoxazolonyl) ureas	Inhibition	Inhibits HSL	Diabetes	(5-(2H)-isoxazolonyl) ureas, inhibitors of hormone-sensitive lipase, an enzyme of potential importance in the treatment of diabetes.
3	BIOSIS / 2004:256580	Inhibitors of hormone sensitive lipase	Carbazates	Inhibition	Inhibits HSL	Peripheral insulin resistance (in obese, prediabetic and diabetic individuals)	Carbazates, inhibitors of the catalytic activity of HSL. HSL is a potential pharmacological target for the prevention of peripheral insulin resistance in obese, prediabetic and diabetic individuals.
4	BIOSIS / 2004:136651	Inhibitors of hormone sensitive lipase	Methyl-phenyl-carbamoyl-triazoles	Inhibition	Inhibits HSL	Type 2 diabetes, metabolic syndrome, and impaired glucose tolerance	Methyl-phenyl-carbamoyl-triazoles are potent HSL inhibitors. HSL regulates fatty acid metabolism makes it an pharmacological target for the treatment of insulin resistant and dyslipidemic disorders where a decrease in delivery of fatty acids to the circulation is desirable in individuals with type 2 diabetes, metabolic syndrome, or impaired glucose tolerance.
5	BIOSIS / 2002:429399	Inhibitors of hormone sensitive lipase	Cyclipostins	Inhibition	Inhibits HSL	Type 2 diabetes	Cyclipostins are inhibitors of hormone-sensitive lipase (HSL). HSL is a key enzyme of lipid metabolism and its control is therefore a target in the treatment of diabetes mellitus.
6	EMBASE / 1998360072	Moderate dose of fish oil on glycemic control and in vivo insulin action in type 2 diabetic men	Fish oil	Up-regulation (increase the amount of mRNA HSL in adipose tissue)	Up-regulates HSL expression	Type 2 diabetes	This study is on effect of a moderate dose of fish oil on glycemic control and <i>in vivo</i> insulin action in type 2 diabetic men with elevated plasma triacylglycerols. In conclusion, A moderate dose of fish oil did not lead to deleterious effects on glycemic control or whole-body insulin sensitivity in type 2 diabetic men. Fish oil tended to increase the amount of mRNA HSL in adipose tissue.
7	DISSABS / 2006:21112	Inhibitors of hormonesensitive lipase	Cyclipostins	Inhibition	Inhibits HSL	Type 2 diabetes	Article is on synthesis of cyclipostins. Cyclipostins are novel class of natural product possesses strong inhibitory action against hormone-sensitive lipase and has potential in the development of therapeutic agents to regulate lipolysis for the treatment of noninsulin-dependent diabetes mellitus (NIDDM).
8	DISSABS / 1999:39502	Beta3-adrenergic agonist	Trecadrine	Stimulation	Stimulates HSL activity	Diabetes, and obesity	Beta3-adrenergic agonist, trecadrine increases the activity of hormone sensitive lipase and the consumption of oxygen in vitro in white fat.