

INSULINS

Preparation	Brand		Route	Onset (hrs)	Peak (hrs)	Duration (hrs)	Source
INJECTABLES							
Insulin Aspart	NovoLog ²	⊗	SC, IV, CSII	≤0.25	1–3	3–5	human
Insulin Aspart Protamine/ Insulin Aspart	NovoLog Mix 70/30 ²	⊗	SC	≤0.25	2.4	24	human
Insulin Detemir	Levemir ²	⊗	SC	1	none	24	human
Insulin Glargine	Basaglar ³	⊗	SC	—	none	≥24	human
	Lantus ³	⊗	SC	1.1	none	≥24	human
	Toujeo	⊗	SC	6	—	24–120	human
Insulin Glulisine	Apidra ³	⊗	SC, CSII, IV ⁴	≤0.25	1	2–4	human
Insulin Lispro	Humalog ³	⊗	SC, CSII	≤0.25	1	3.5–4.5	human
Insulin Lispro Protamine/ Insulin Lispro	Humalog Mix 75/25 ³	⊗	SC	≤0.25	0.5–1.5	24	human
	Humalog Mix 50/50 ³	⊗	SC	≤0.25	1	16	human
Insulin Injection Regular (R)	Humulin R U-100 ¹	OTC	SC, IM, IV ⁴	0.5	2–4	6–8	human
	Humulin R U-500 ¹	⊗	SC	0.5	1.75–4	24	human
	Novolin R ²	OTC	SC, IM, IV	0.5	2.5–5	8	human
Insulin Isophane Suspension (NPH)/Regular Insulin (R)	Humulin 70/30 ¹	OTC	SC	0.5	2–12	24	human
	Novolin 70/30 ²	OTC	SC	0.5	2–12	24	human
Insulin Isophane Suspension (NPH)	Humulin N ¹	OTC	SC	1–2	6–12	18–24	human
	Novolin N ²	OTC	SC	1.5	4–12	24	human

ORAL INHALATIONS

Insulin	Afrezza	⊗	oral inh	0.2–0.7	—	2–3	human
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Key: CSII = continuous subcutaneous insulin infusion

¹Recombinant (using *E. coli*) ²Recombinant (using *S. cerevisiae*) ³Recombinant human insulin analogue (using *E. coli*)

⁴IV to be used in a clinical setting under proper medical supervision

Onset for injectable formulations is always for the SC route. All times are approximate. Maximum effect occurs between hours listed in duration column; actual effect may last longer. Injectable insulins listed are available in a concentration of 100Units/mL; Humulin R, in a concentration of 500Units/mL for SC injection only, is available by prescription from Lilly for insulin resistant patients who are hospitalized or under close medical supervision. (Rev. 1/2017)