



MEMORANDUM

Tandem announces US launch of Control-IQ+; results presented at ATTD published in the New England Journal of Medicine – March 19, 2025

New algorithm offers expanded ranges for weight and total daily insulin, enhanced extended bolus, and now offers temporary basal rate adjustments when AID is turned on

Tandem [announced](#) Tuesday that it has launched Control-IQ+ in the US for people with type 1 diabetes (T1D) aged two years and older and adults with type 2 diabetes (T2D). This follows FDA clearance of the algorithm for adults with T2D at the end of [last month](#). Control-IQ+ is compatible with both the t:slim X2 and Tandem Mobi pumps and features several enhancements compared to its predecessor Control-IQ (see more below). All eligible, in-warranty Tandem users can upgrade to Control-IQ+ via a free remote software update, and pumps preloaded with Control-IQ+ are now shipping to new users.

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New features: Expanded ranges for weight and total daily insulin, improved extended bolus, and increased temporary basal rate flexibility

Control-IQ+ adjusts insulin delivery every five minutes based on predicted glucose values with an AutoBolus feature to deliver correction boluses for detected missed meal announcements. Control-IQ+ offers several new features to tailor the algorithm's performance to more diverse patient needs. This includes:

- **Expanded weight and total daily insulin inputs:** Control-IQ+ permits broader weight (20-440 lbs. compared to [55-308 lbs.](#) with Control-IQ) and total daily insulin ranges (5-200 units compared to [10-100 units](#) with Control-IQ), supporting wider insulin requirements.
- **Enhanced extended bolus:** The extended bolus feature can be enabled for up to eight hours with Control-IQ+ active to improve postprandial glycemic management. Previously, extended boluses with Control-IQ enabled were restricted to [two hours](#) maximum, although extended boluses could be administered for up to eight hours if Control-IQ was disabled.
- **Increased flexibility for temporary basal rates:** Users can now enable temporary basal rates with Control-IQ+ active to address short-term needs, such as exercise, stress, and illness. With Control-IQ, temporary basal rates were only available when Control-IQ was [disabled](#).

FDA clearance for T2D based upon 2IQP pivotal trial results announced at ATTD 2025

Tandem is the second AID manufacturer to receive FDA marketing authorization for use in T2D, following Insulet's [Omnipod 5](#). Control-IQ+'s clearance for T2D was supported by positive results from the [2IQP](#) pivotal trial, which were announced in Tandem's industry symposium on Wednesday at ATTD 2025.

The trial enrolled 319 participants with T2D on basal-bolus insulin therapy, comparing use of t:slim X2 with Control-IQ+ and Dexcom G6 to a control cohort on MDI with Dexcom G6 for 13 weeks. In [results presented at ATTD](#) and simultaneously published in [NEJM](#), Time in Range (TIR) increased by 16% for those using Control-IQ+ (compared to MDI/pump without automated bolusing) and A1c decreased from 8.2% at baseline to 7.3% at 13 weeks. There was only one severe event of hypoglycemia and no DKA across either study cohort, demonstrating the safety of this algorithm.

Importantly, these findings remained true even when stratified by demographics, including age, race, gender, income, and education level. Even further, all bolus strategies were deemed “effective” with the use of Control-IQ+, which means that similar A1c reduction and TIR increase could be achieved regardless of carbohydrate counting, meal announcements, or other interaction with the system.

Close Concerns’ Questions

1. How will the enhanced extended bolus feature improve postprandial outcomes compared to Control-IQ?
2. How will the expanded total daily insulin ranges tailor performance for people with T2D and drive improved outcomes for this population specifically?
3. To what extent are people with T2D expected to adopt t:slim X2 compared to Tandem Mobi given the differences in insulin reservoir capacity (300 units vs. 200 units, respectively)?
4. To what extent will Control-IQ+ drive increased adoption from MDI vs. competitive conversions?

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