Dynamic Workout Planner – AI Health Coach

This document serves as a structured knowledge base for a RAG-powered Dynamic Workout Planner. It is designed to generate personalized, safe, and context-aware workout routines using weather conditions, daily activity (steps/energy), and user readiness.

1. Inputs Used by AI Workout Planner

1   Weather: temperature, rain, AQI, humidity
2   Daily activity: steps count, sedentary time
3   Energy indicator: low / medium / high
4   Time of day: morning / afternoon / evening
5   Health risk flag: none / diabetes / heart-safe

2. Decision Logic Rules

1   If rain or AQI is poor → prefer indoor workouts
2   If temperature > 32°C → avoid HIIT and outdoor running
3   If steps < 3000 → light or beginner routine
4   If steps 3000–7000 → moderate routine
5   If steps > 7000 → advanced routine (if no risk)
6   If health risk detected → downgrade intensity

3. Workout Plans by Context

Low Energy / Beginner	10 min walk + 10 min mobility + 5 min breathing
Moderate Energy	20 min brisk walk + 15 min bodyweight + stretch
High Energy	25 min cardio + 20 min strength + core
Rain / Poor AQI	Indoor yoga + chair squats + stretching
Hot Weather	Early walk + hydration + avoid intense training
Diabetes Friendly	Post-meal walk + resistance bands
Heart Safe	Low intensity walk + breathing + rest

4. Output Format for AI Response

The AI should return workouts in a structured format: - Workout Type - Duration - Exercises - Safety Notes - Weather-based adjustments

Disclaimer: This workout planner provides general fitness guidance only. It does not replace medical advice. Users with medical conditions should consult healthcare professionals before starting any workout program.