






DMAIC – A SNAPSHOT

				
DEFINE	MEASURE	ANALYSE	IMPROVE	CONTROL
What exactly is the issue and can we deal with it	Quantify the current state (determine the baseline)	Identify the cause of the problem	Implement and verify the solution	Maintain the Solution
Aim: Clearly state the specific business problem, goal, potential resources, project scope and high-level project timeline	Aim: Understand the "As Is" state – how the process is performing and what the magnitude of the problem is	Aim: Get to the root cause(s) of the problem, flesh it out, and derive the "To Be" or "future state"	Aim: Determine a solution which will solve the identified problem	Aim: Ascertain that the action improvements carried out in the <i>Improve</i> phase have worked and are well-maintained
What exactly is the issue? Problem/goal statement Business Opportunity Project documentation - other Dealing with the issue Project charter Project team / Team charter Project management / Project plan Process Definition - SIPOC / High level 'As Is' Process Map Stakeholder Management (inc communication plan) VoC - CTQ / Customer requirements / Customer/Feature diagrams / Kano	Quantify the current state Operational definitions Data collection method/plan Data collection form Sampling (and frequency) Is data representative/relevant? SPC / KPIs Spaghetti diagrams Pareto Charts Gemba walk / Process stapling Histograms What is current status of process? Establish baselines Current VSM (As Is) Process Capability (Cp / Cpk) Yield / DPMO / Process Sigma Quick wins identified/proposed	Move from subjectivity to fact SPC - Analyse Identified/tested root causes Brainstorming Select probable root causes Validated root causes 5 Whys / Fishbone Affinity Diagrams Lean process analysis Regression Analysis Correlation Tools Impact of change on Process VSM target (To be) Process capability (To be) FMEA	What solutions are available and what is best for the process? Consensus tools Problem solving 5S / Poka Yoke Brainstorming What is the cost/benefit/risk? Assessment criteria Root cause analysis / FMEA Statistical data analysis Implementing the 'fix' Implementation schedule/events Pilot plan / Action plans OTGIs Validation of benefits Control plan	Has it been embedded in BaU? SPC Visual management Continuous kaizen, 5S etc Standard Operating Procedures Updated working practices Training manuals / Training plans How will progress be monitored? Visual management Process control systems Was the project goal achieved? Benefit measurement Key Performance Indicators (KPIs) Close the project Project report (inc lessons learned) Team celebration / Team disbanded Continuous/Ongoing Improvements...