

PROJECT BRIEFING

PRODUCTIVITY IMPROVEMENT CAPACITY ANALYSIS



CyOptics designs, develops and manufactures optical engines for broadband access, metro and long-haul communications systems. They also provide complete contract design, foundry and packaging services. Their expertise lies in both the monolithic and hybrid integration of optical components that enable their customers' micro-integrated sub-systems.

PROJECT OBJECTIVES

To develop operational data for the chip manufacturing area to be used to update the capacity model.

To identify improvement opportunities in scheduling and manufacturing and prioritize based on viability and short- and long-term timeframes.

To create an implementation plan for long-term improvements.

PROJECT SUMMARY

Working in the chip fabrication area, ESPI personnel reviewed and analyzed all operations, including the product mix and associated process routings. The team performed a detailed study of tool capacity, reviewed process yield statistics, and evaluated optimized resource allocation and required staffing levels in order to identify bottleneck operations. Additional study involved sampling requirements and their impact on production as well as evaluating how planning and scheduling was performed in the chip fab area.

Based on these analyses and observations, the project team identified what improvements could be made to increase production in the area through improved resource, manpower and tool utilization. These recommendations were evaluated against the benchmarks established in the early stage of the project.

Following consultation with CyOptics' management team, a plan for improving the current operation and increasing capacity through the addition of equipment and manpower was developed.

"Many of the improvements identified during this project have been implemented during the study and others are underway . . . These changes will lead to a planned throughput improvement of 25%."

President and CEO
CyOptics

Project work completed in partnership with Ben Franklin Technology Partners of Northeastern Pennsylvania and the Enterprise Systems Center of Lehigh University.

RESULTS



Improved utilization of the chip fab tooling.



Identification of proper manpower staffing in all chip fab areas.

