Quality Training Program

Optimization of the management of a medical oncology consultation (OM) and decrease of the waiting time linked to the administration of a systemic treatment

Almudena García Castaño
Raquel Jimeno Maté

University Hospital Marqués de Valdecilla

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Institutional Overview

- The Marqués Valdecilla University Hospital (HUMV) is the main hospital in Cantabria and is a reference center for the Community and for other geographical areas. The Medical Oncology Service performs its assistance, research and teaching work in the External Consultations and in the Hospitalization.

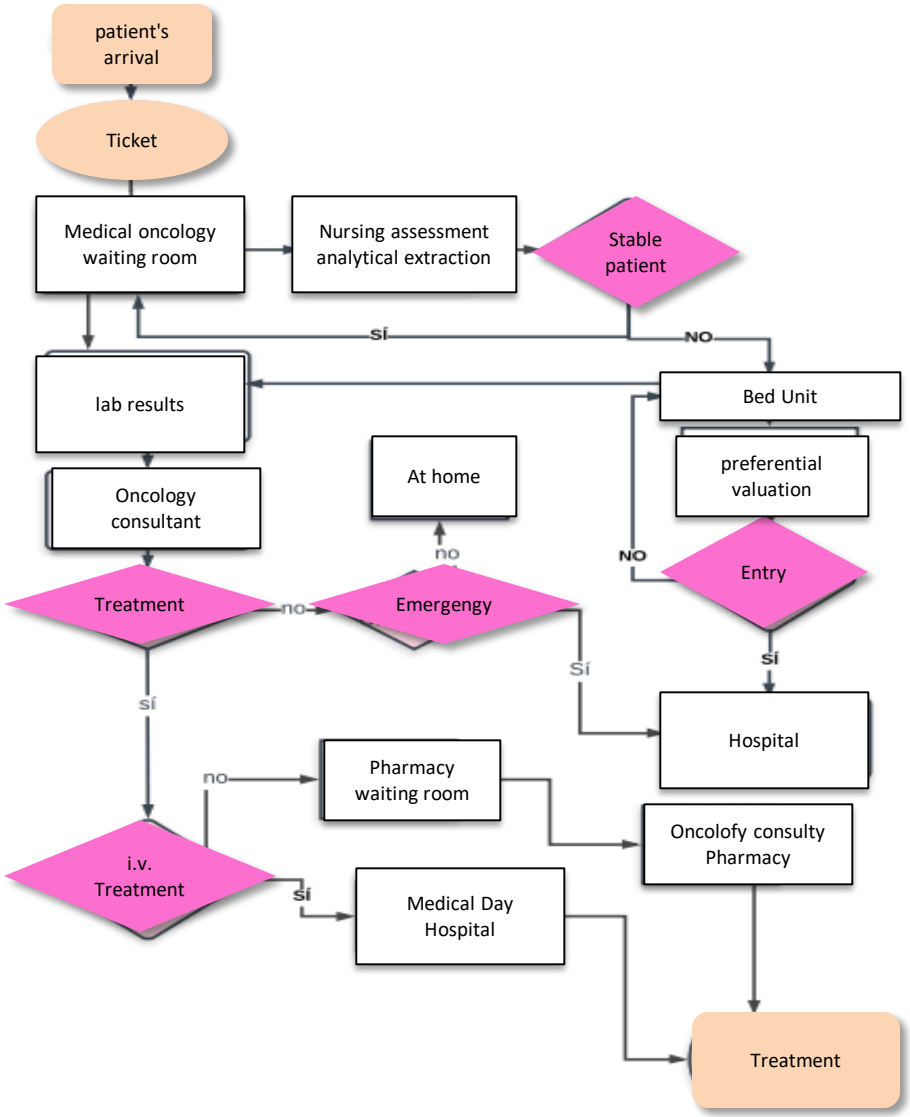
- The medical staff of the Medical Oncology Service is composed of 1 Head of Service, 12 Staff and 2 Residents per year (10 Residents in total)

- The activity of external consultations during the year 2017 is detailed below: 1,276 first consultations and 18,332 successive consultations, a figure that has increased in recent years

Problem Statement

- 30% (n = 21) of cancer patients experienced a hospital stay of more than 4 hours in the period from November 15-27, 2018
- Oncology patient care must be multidisciplinary and involve different services
- The administration of systemic treatment (both oral and intravenous) involves the Oncology Pharmacy units, the Medical Day Hospital and the outpatient clinics of medical oncology
- The lack of coordination between these units implies an increase in the hospital stay of outpatients with the consequent impairment in their quality of life

Process Map


patient's arrival
Ticket
Medical oncology waiting room
Nursing assessment analytical extraction
Stable patient
SÍ
NO
lab results
Bed Unit
preferential valuation
Oncology consultant
At home
no
NO
Entry
Treatment
no
Emergengy
Sí
SÍ
sí
Hospital
no
Pharmacy waiting room
Oncolofy consulty Pharmacy
i.v. Treatment
Sí
Medical Day Hospital
Treatment

Team Members

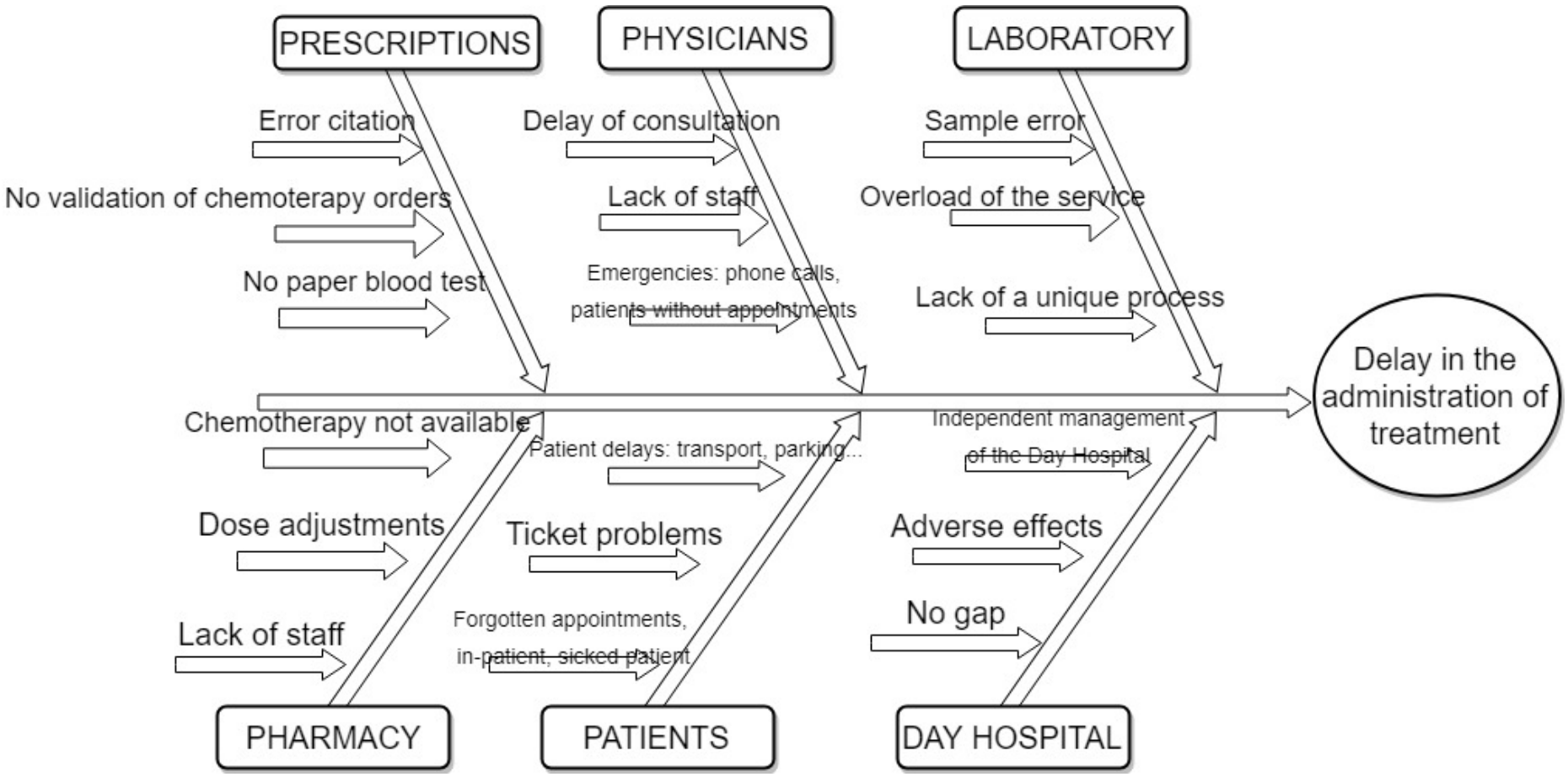
Almudena García Castaño and Raquel Jimeno Maté

Virginia Martínez Callejo (Oncology Pharmacy)
Marisol González Sobrado (Consultation nurse)
Carlos Rodriguez de la Vega (Day hospital nurse)
Ignacio Magaldi (administrative assistant of consultation)

Fernando Rivera Herrero (OM chief of service)

Patients and families

Cause & Effect Diagram



Diagnostic Data (I)

N = 69
Oral treatment: 26
IV. treatment: 43
- same day 14

Patient's arrival time (ticket)
Analytical extraction time
Time of consultation in medical oncology
Consultation time in Oncology Pharmacy
Start time of treatment in the medical day hospital (MDH)

Time from arrival (ticket) to analytical
Time from analytics to consultation
Time from OM consultation to Oncology Pharmacy
Time from OM consultation to MDH treatment

Diagnostic Data (II)

- Patients with ORAL treatment (n 26)
    - Pharmacy dispensing time - Ticket pickup time
    - 3h 51min (231 minutes) on average
- Patients with I.V. treatment (N=43)
    - (Time of consultation - time collected ticket) + (day of administration in HDM)
    - Same day = 5h 23 min (323 minutes) on average
    - Different day = 43 hours (2576 minutes)

Aim Statement

- ✓ Decrease the waiting time in the hospital and improve the care and quality of life of the oncological patient in treatment

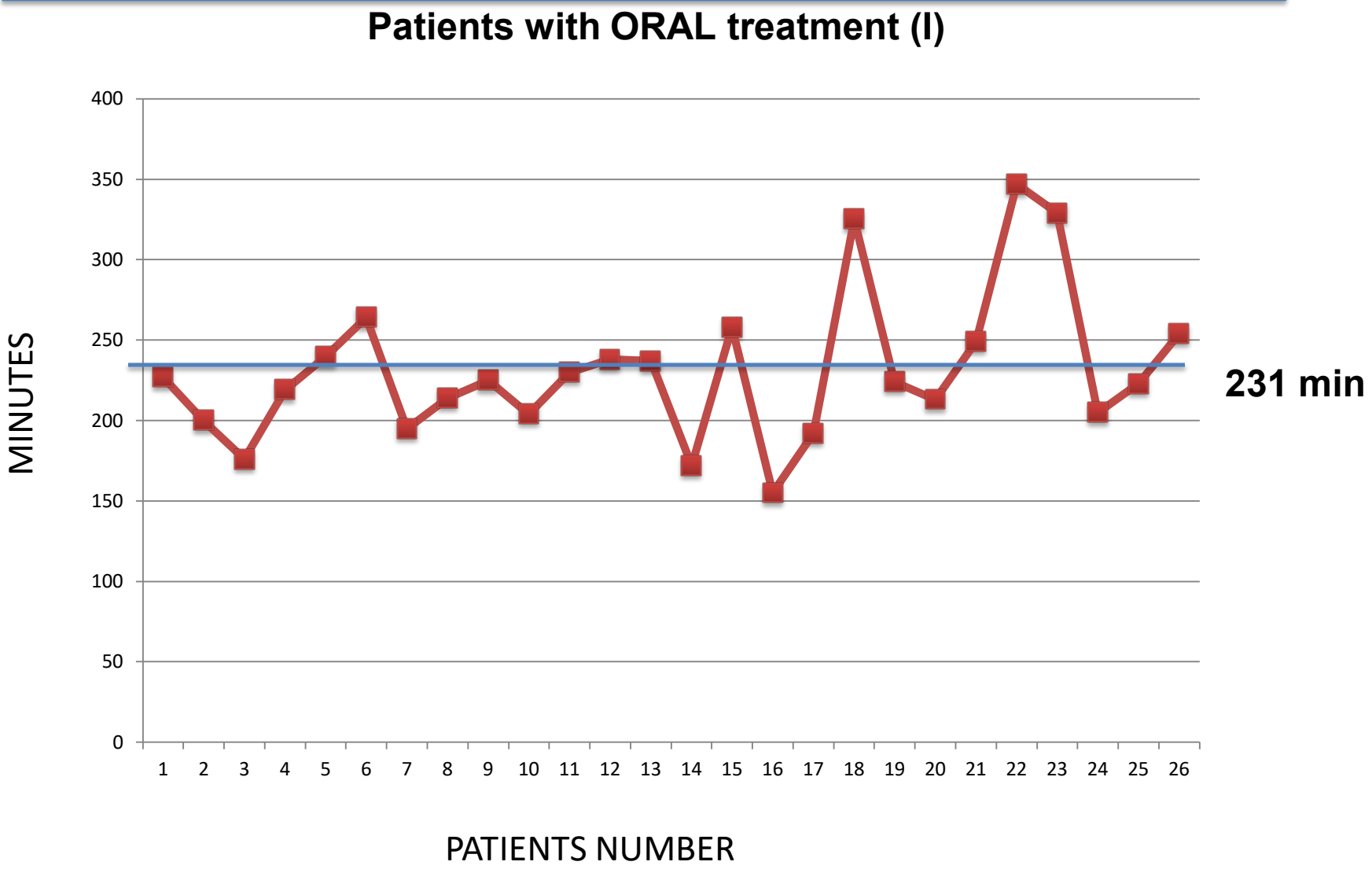
- ✓ In those patients with oral treatment it would be desirable to have a hospital stay of no more than 3 hours (3h51min) and in those with iv treatment a hospital stay of no more than 4 hours (5h23min) (if the treatment is that day)

Measures

- Measure: hour of analytical extraction (theoretical and real), time of consultation (theoretical and real), time dispensation (theoretical and real) and time of administration of endovenous treatment (theoretical and real).
- Population of patients: patients cited in an OM consultation under treatment (between 11/15 and 11/27/2018).
- Methodology of calculation: average waiting time in the HUMV
- Data source: Citation program (Ticares) and computerized clinical history of HUMV (Altamira)
- Frequency of data collection: consultation number 267 on days 15, 19, 21, 22 and 27 of November 2018.

Expected times	Identification problem delay
Ticket → Extraction (15 minutos)	Patients/prescription/nurse
Extraction → Consulty (60 minutos)	Laboratory/Doctor
Consulty → Pharmacy (15 minutos)	Pharmaceutical dispensation
Consulty → Medical Day Hospital	Medical Day Hospital

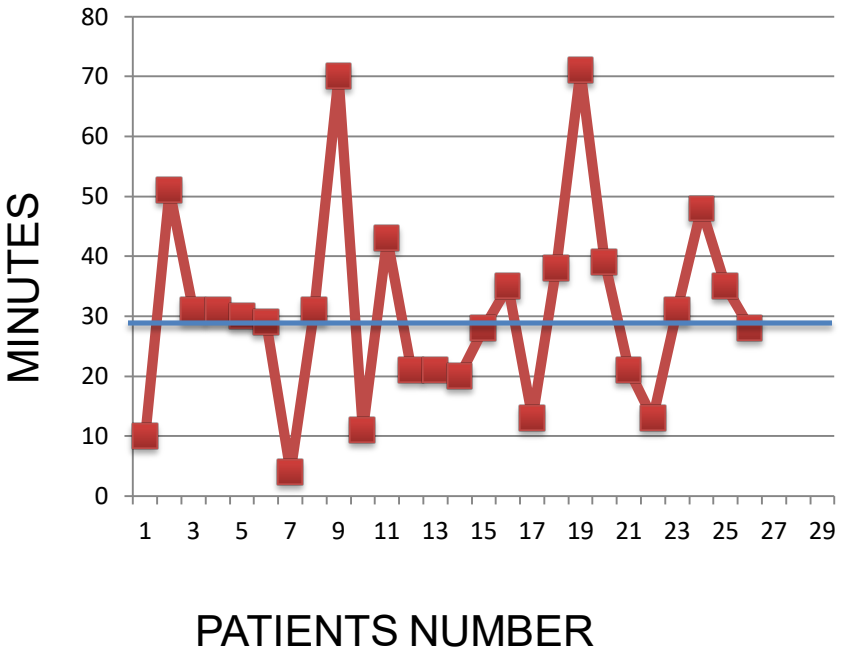
Baseline Data



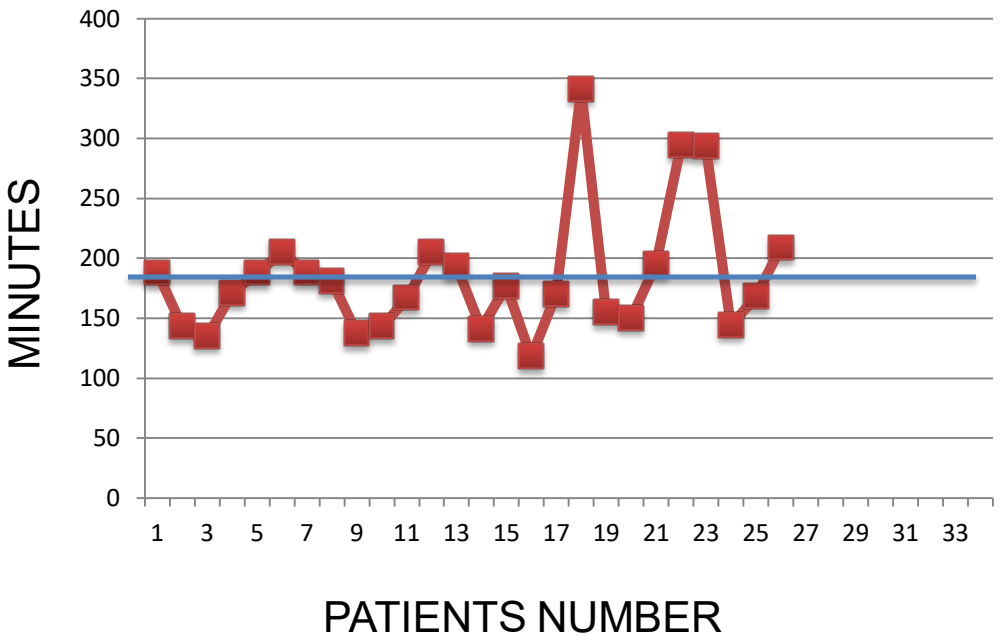
Baseline Data

Patients with ORAL treatment (II)

TICKET- BLOOD TEST (30min)



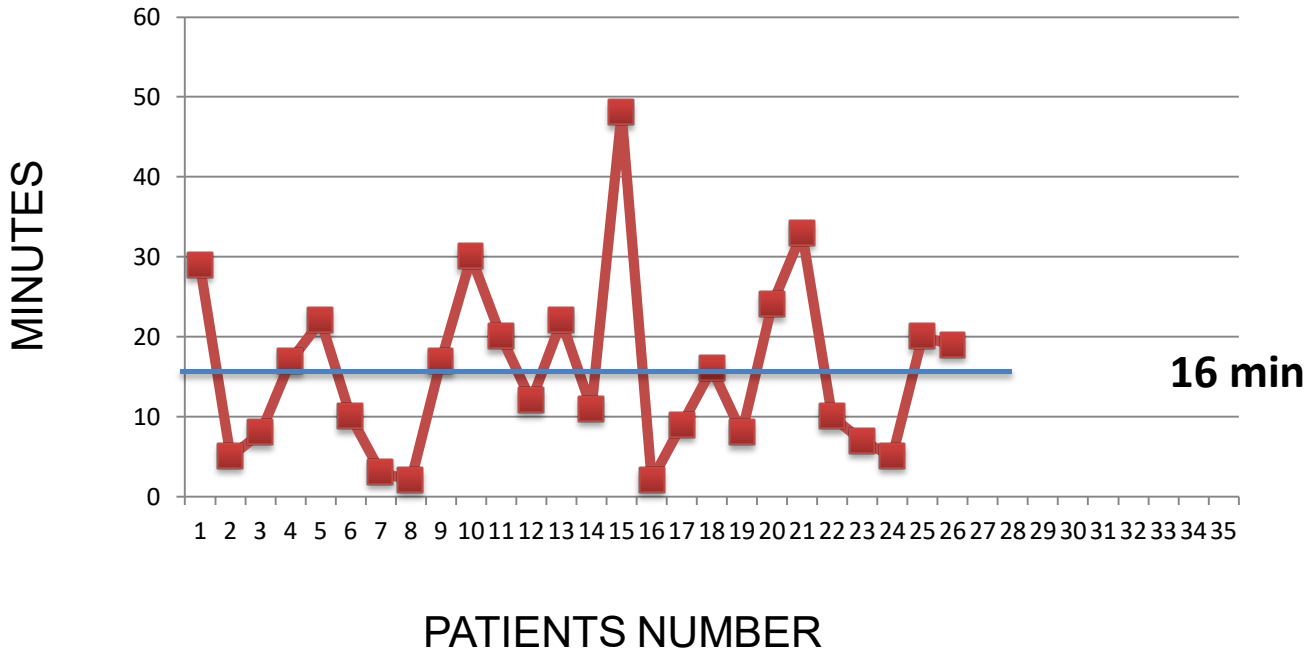
BLOOD TEST-CONSULTATION (187min)



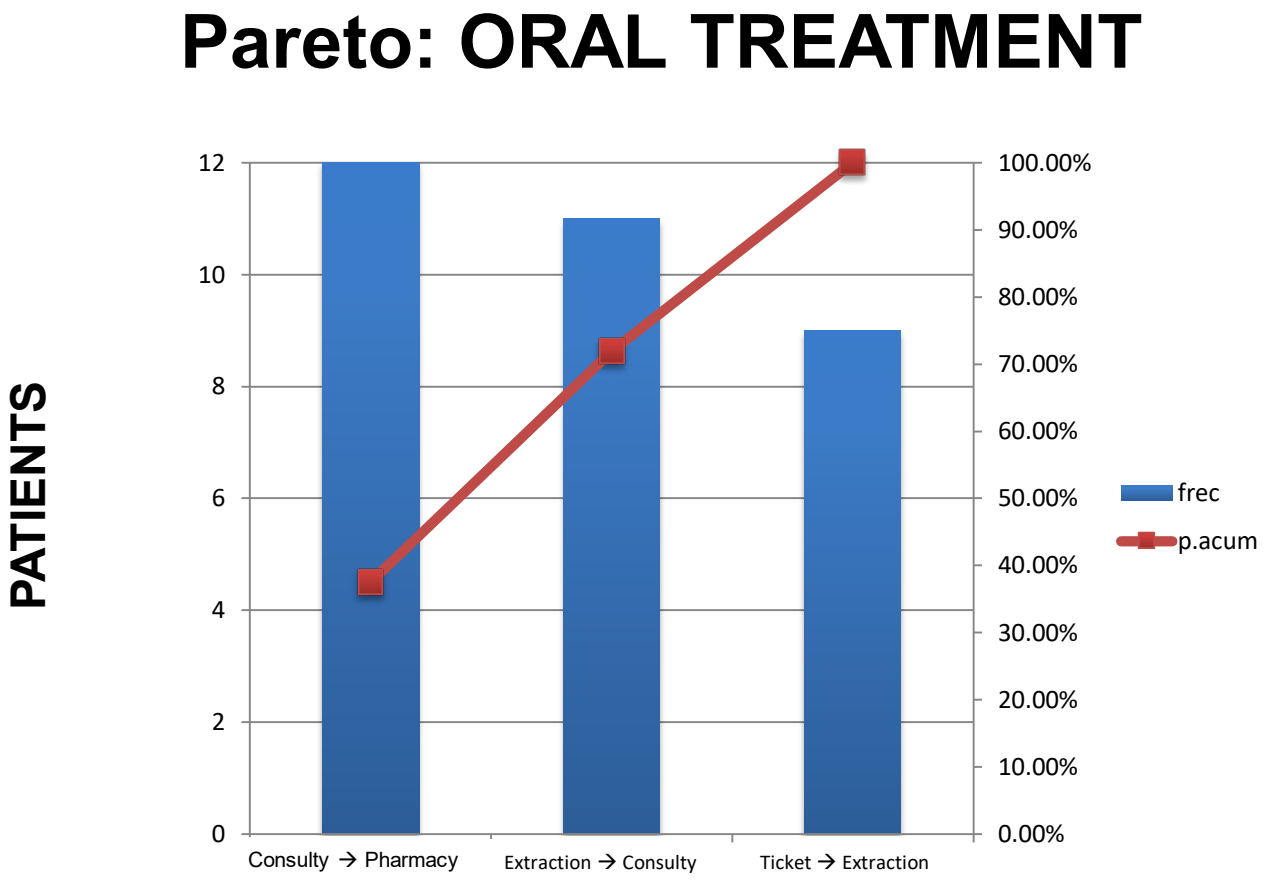
Baseline Data

Patients with ORAL treatment (III)

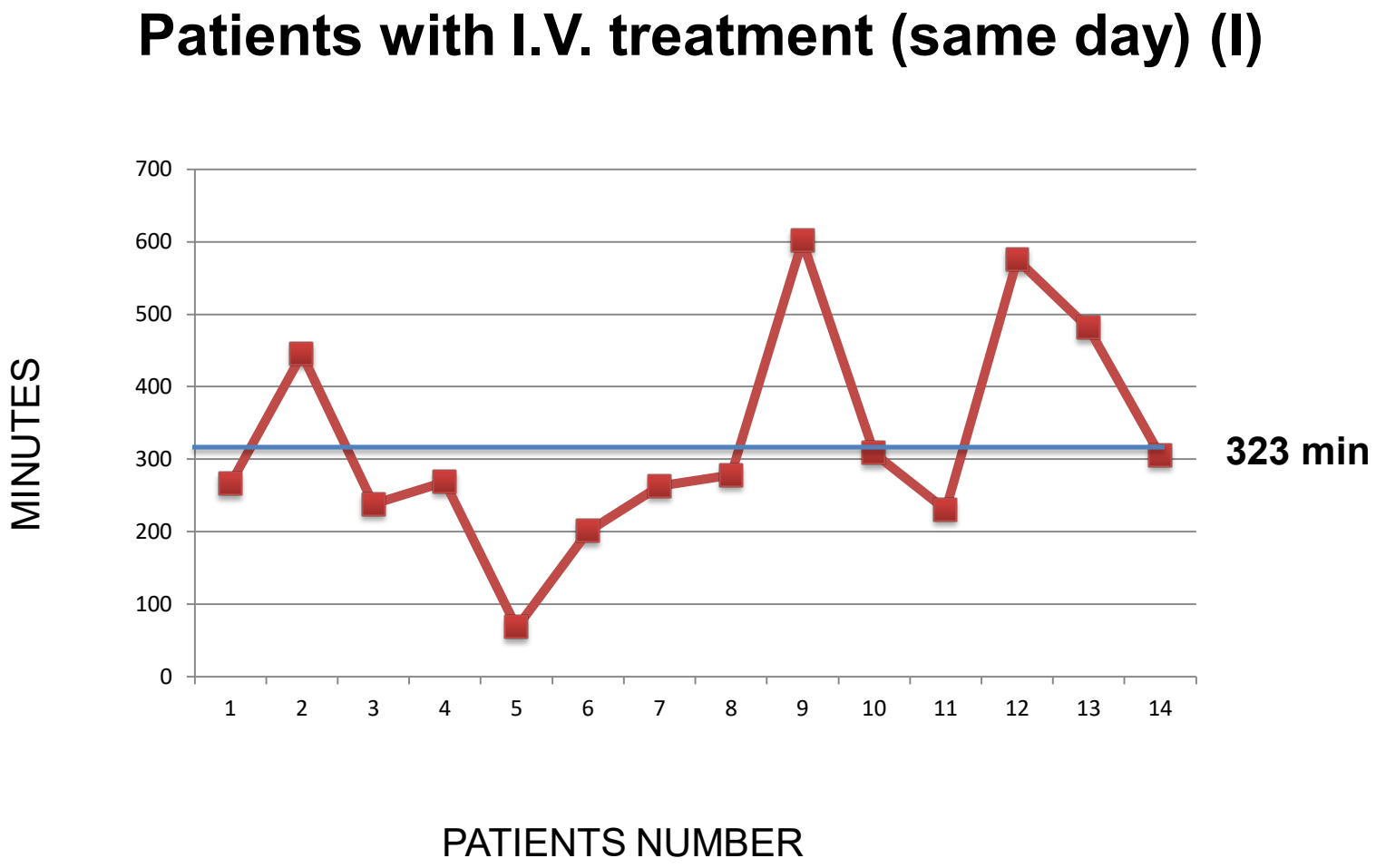
- CONSULTATION – PHARMACY (16 minutes)



Baseline Data



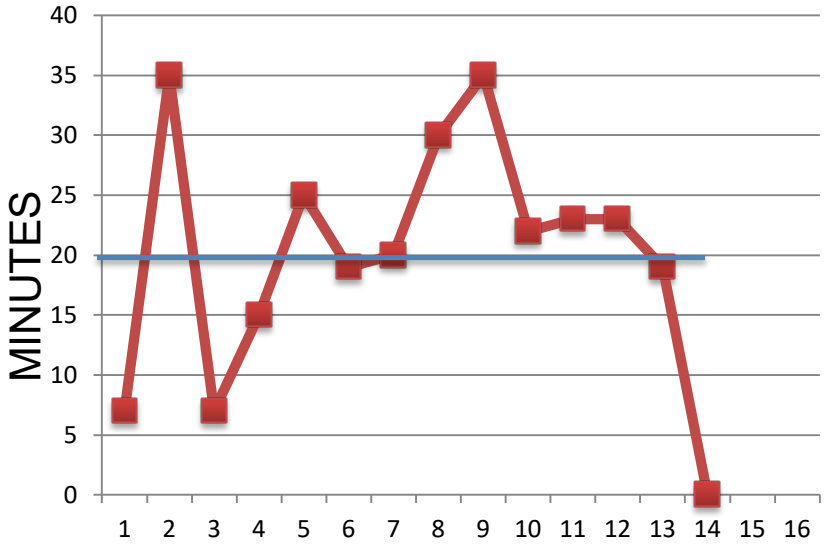
Baseline Data



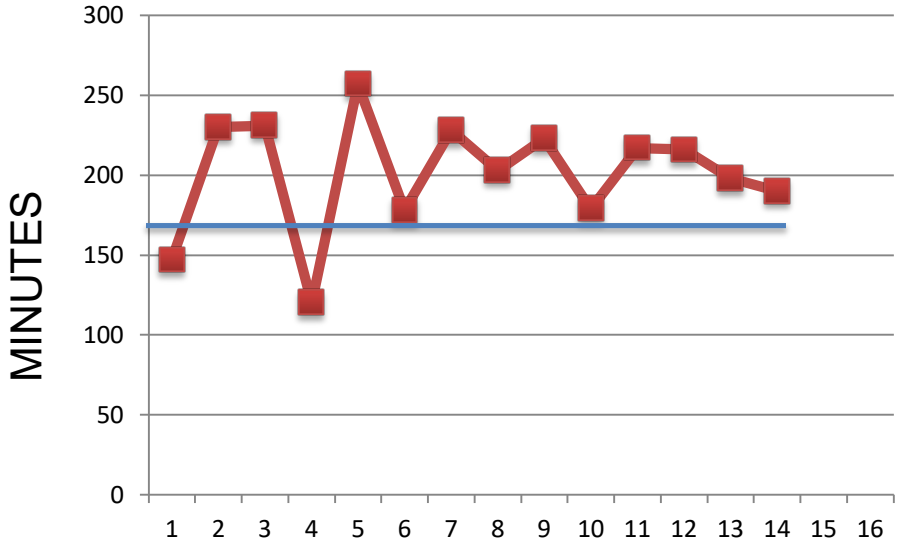
Baseline Data

Patients with I.V. treatment (same day) (II)

TICKET-ANALÍTICA (20 min)



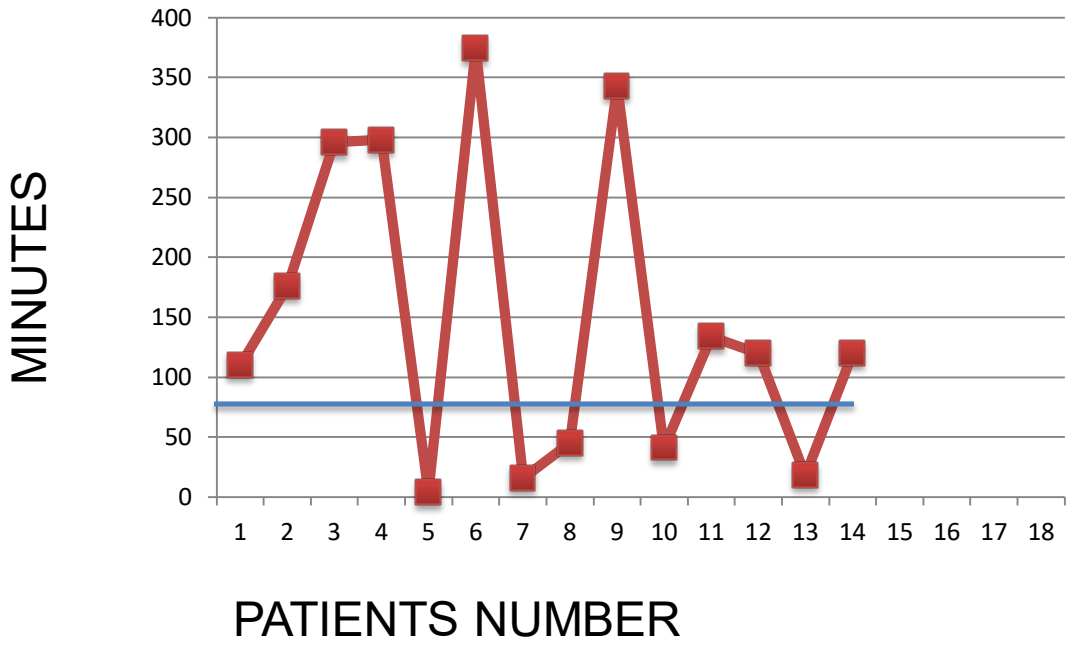
ANALÍTICA-CTA (174 min)



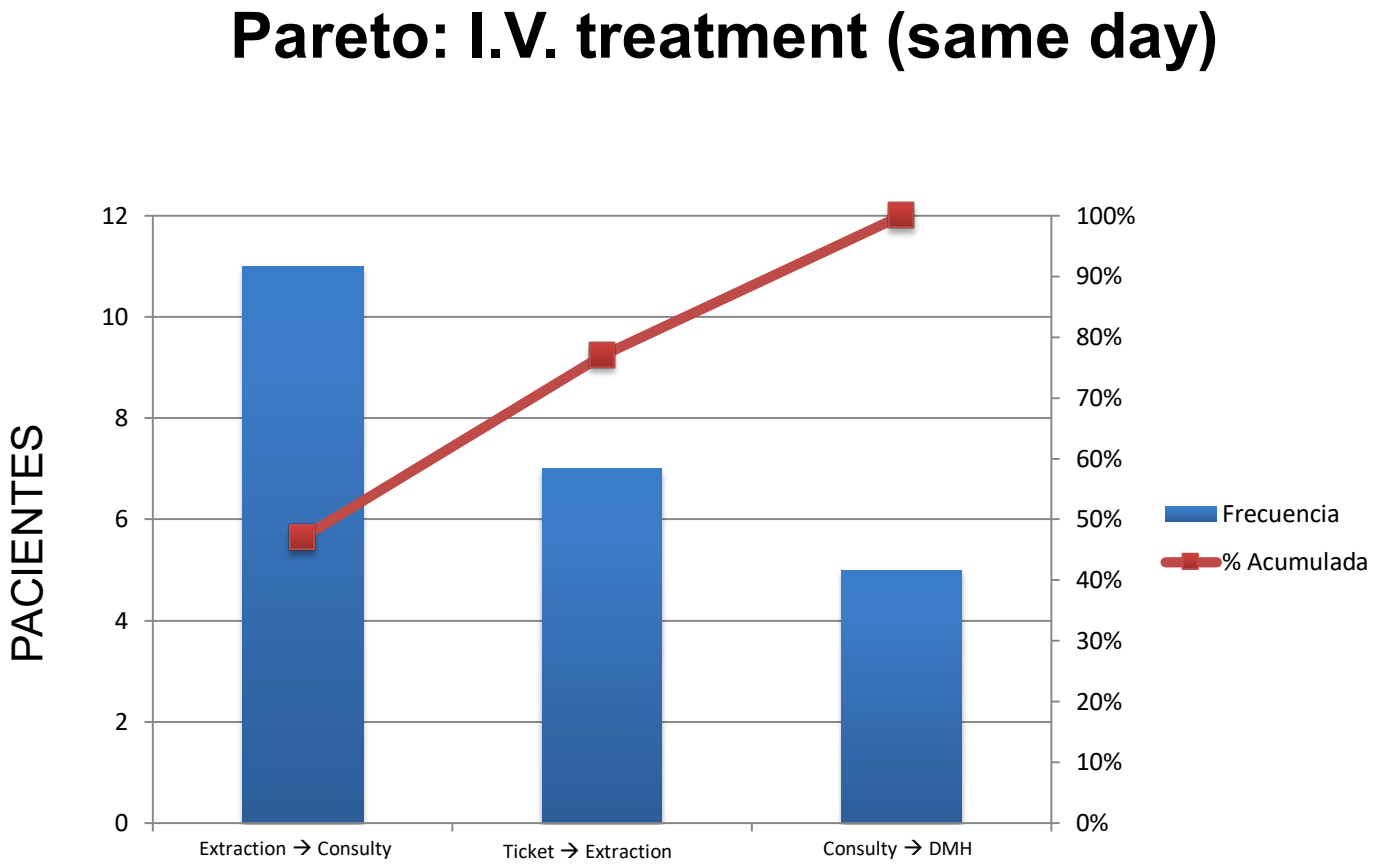
Baseline Data

Patients with I.V. treatment (same day) (III)

CONSULTATION-DAY HOSPITAL (149 minutes)



Baseline Data



Prioritized List of Changes (Priority/Pay –Off Matrix)

Impact	Easy	Difficult
High	• Analytic outside the hospital (in clinic) • Analytic every 15 minutes • Stepped extractions • Do not duplicate information	• Medical Day Hospital united to Oncology • Prioritize oncology analytics • support doctor
Low	• Check treatment day before	• More sites in medical day hospital

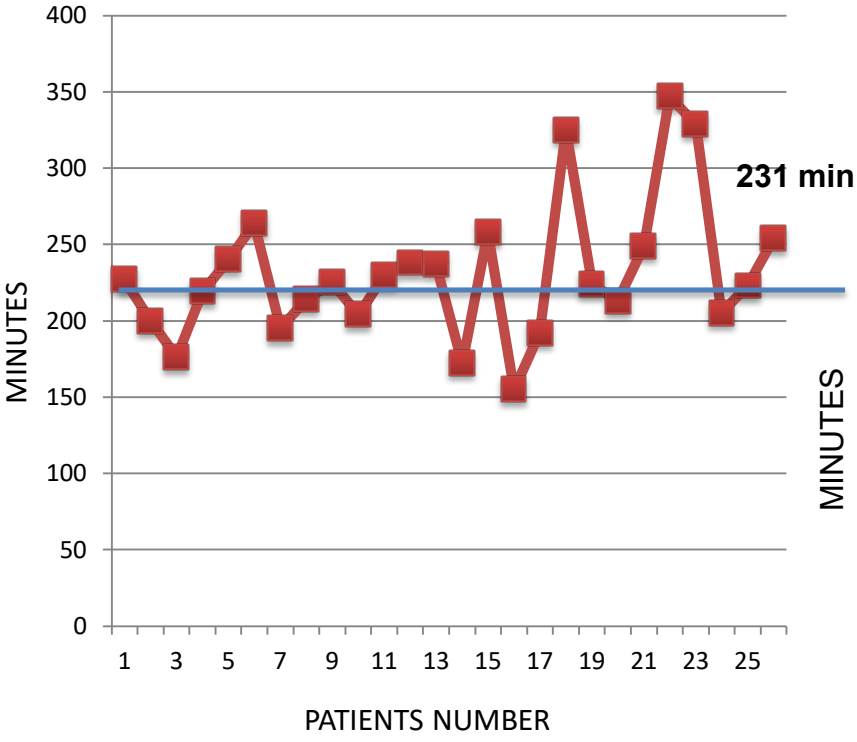
Ease of Implementation

PDSA Plan (Test of Change)

Date of PDSA Cycle	Description of Intervention	Results	Action Steps
15 – 27 / Nov / 2018	• Patient identification • Data collection • Identification of the problem (waiting time of patients in the consultation of excessive medical oncology) • Identification of medical services involved in the problem • Creation of work group	• Base-line data • Identification problem delay	• Analysis of obtained data • Improvement measures • Brainstorming
21-25 / Jan / 2019	• Working group meeting • Data presentation • Brainstorming • Chief service meeting • Responsible laboratory meeting • Nurses meeting	• Plan of action • Patients with oral treatment • Patients with i.v. treatment (same day) • Decide order of improvement measures	• Analysis of obtained data
4-8 / Feb / 2019	• Adapt laboratory use Analytical extractions outside the hospital in patients with oral treatment (some days before)	Decreased waiting time in the hospital	• Analysis of obtained data • Evaluation of results
25 – 28 / Feb / 2019	• Adapt laboratory use Analytical extractions inside the hospital in patients with i.v. treatment Send analytical steps to the laboratory (every 15 minutes) Stepped analytical extraction (citation of patients every 30 minutes)	Decreased waiting time in the hospital	• Analysis of obtained data • Evaluation of results
1 – 5 / Apr / 2019	• Working group meeting • Data presentation • Plan reevaluation	Plan of action	Creation meetings periodic group work

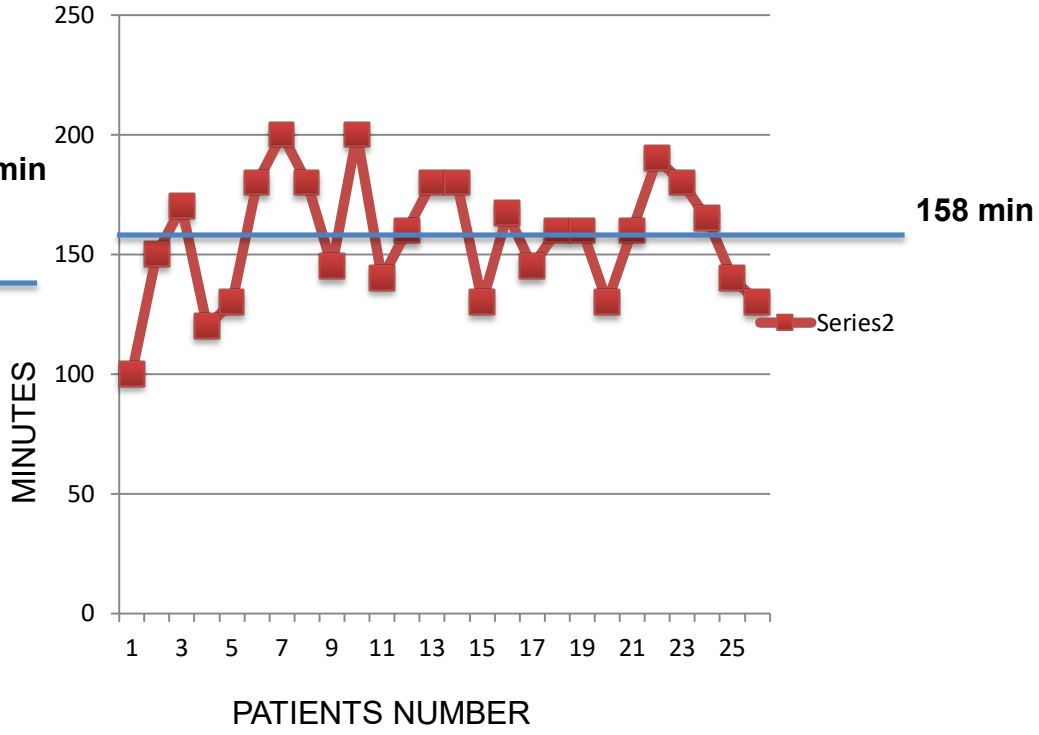
Baseline Data

Patients with ORAL treatment (I)



Change Data

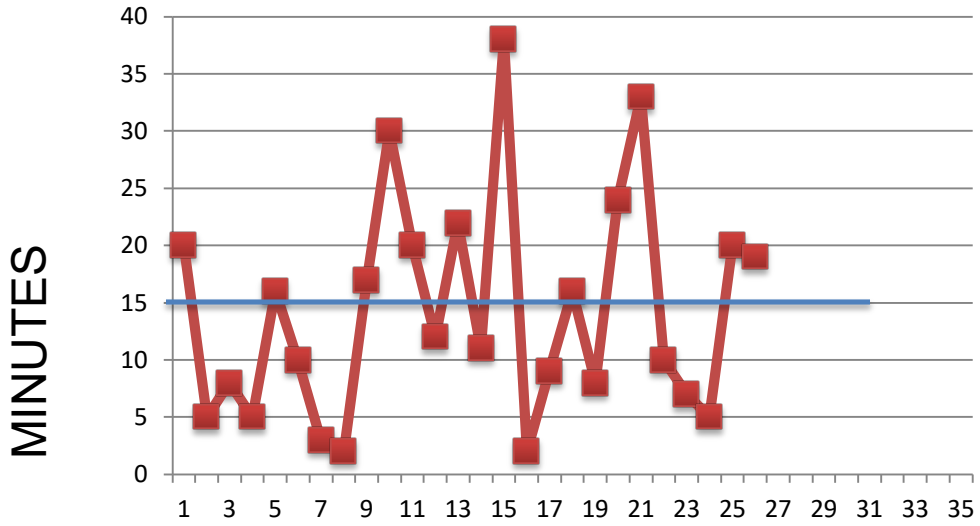
Patients with ORAL treatment (I)



Change Data

Patients with ORAL treatment (III)

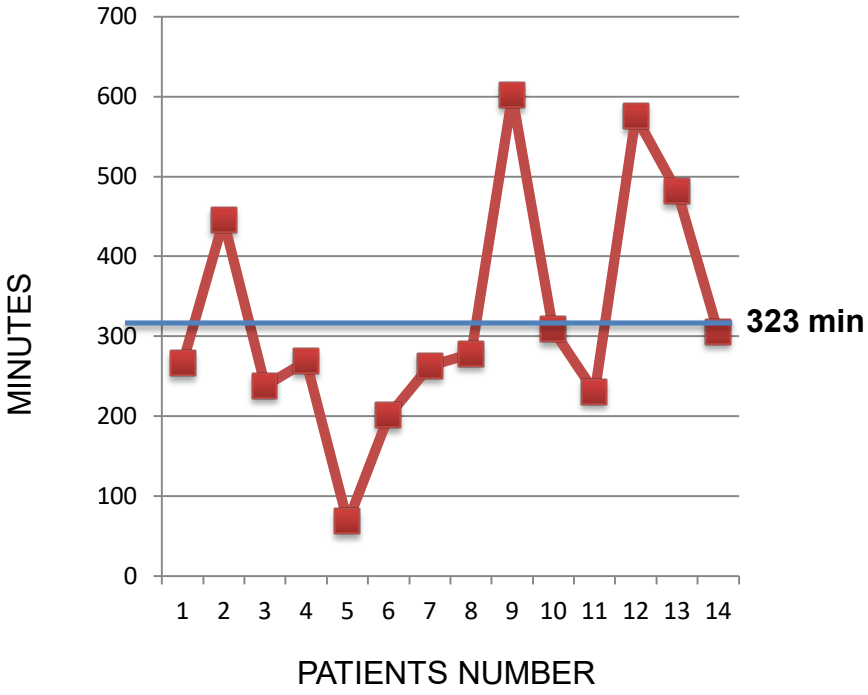
CONSULTY – PHARMACY (15 minutes)



PATIENTS NUMBER

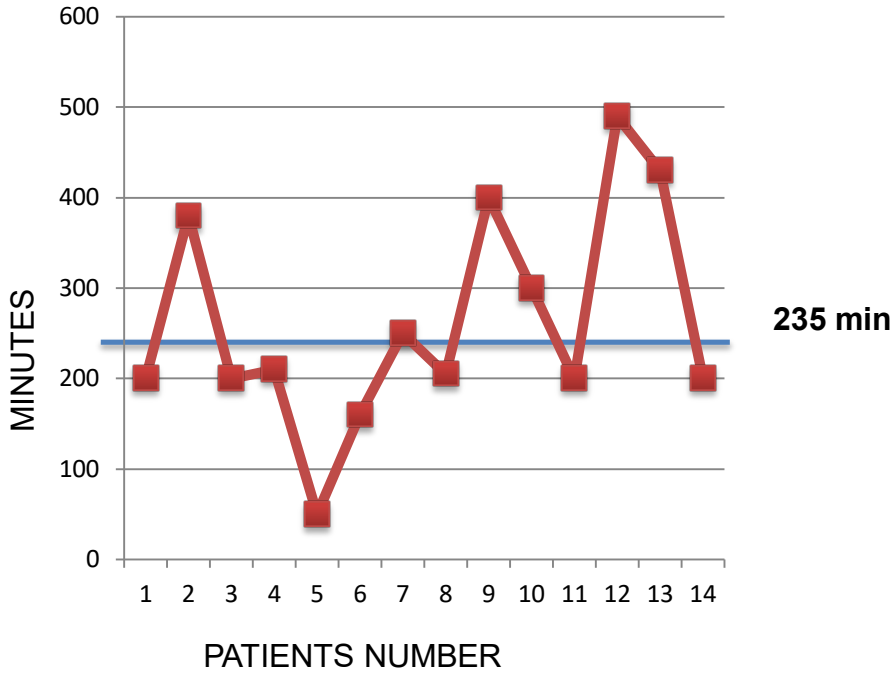
Baseline Data

Patients with I.V. treatment (same day)



Change Data

Patients with I.V. treatment (same day)



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Conclusions

- For the implementation of this project it has been fundamental
  - Creation of a working group
  - Coordination of services involved
  - Identification of the problem
  - Improvement medical identification
  - Implementation of improvement measures
  - We have been able to meet our objective

Next Steps/Plan for Sustainability

- Listen to patients
- Quality surveys
- Improve outsite hospital coordination
- Regular group meetings for improvement

Almudena García Castaño, Medical Oncology
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Optimization of the management of a medical oncology consultation (OM) and decrease of the waiting time linked to the administration of a systemic treatment

AIM: Decrease the waiting time in the hospital and improve the care and quality of life of the oncological patient in treatment

INTERVENTION:

Analytic outside the hospital (in clinic)
Analytic every 15 minutes
Stepped extractions

TEAM: Almudena García Castaño and Raquel Jimeno Maté

- Virginia Martínez Callejo (Oncology Pharmacy)
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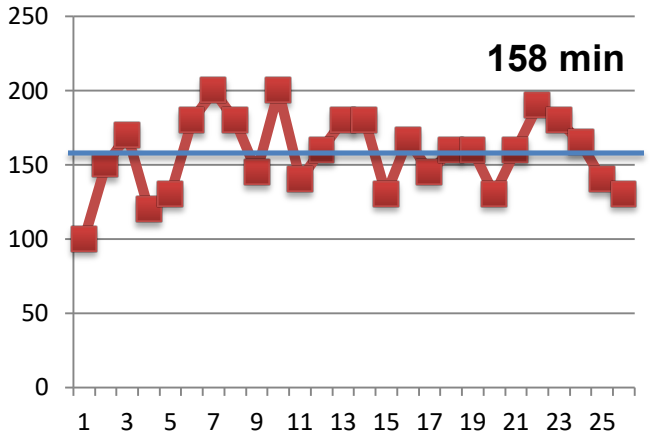
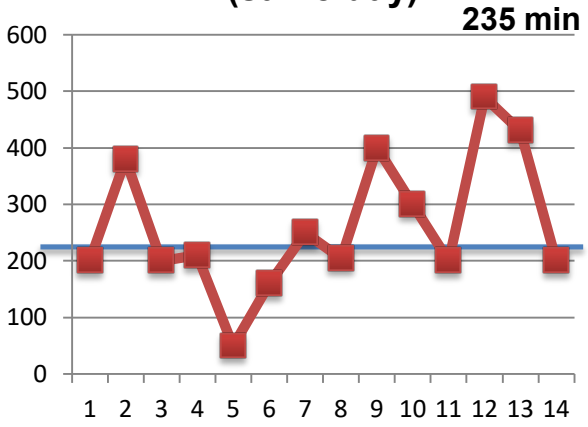
Patients with ORAL treatment



Patients with I.V. treatment (same day)



CONCLUSIONS:

Teamwork is key in improving the process
Coordination
General practisian

NEXT STEPS:

Listen to patients
Quality surveys
Regular group meetings for improvement

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