

Morteza Razavi

Professor of mechanical engineering Department of Mechanical Engineering, University of Science and Culture
m.razavi@usc.ac.ir

Education

Ph.D in Mechanical Engineering, Solid branch from **SHARIF** University
Having M.SC degree in Mechanical Engineering, Solid branch from Science & Technology University (**IUST**)

Summary

Manager of Design & Engineering Company devoted to EPC projects in the oil & gas & mineral industrial. R&D group head in many fields of oil and gas for more than 4 years.

Great and applicable experience in overall Piping & Plant engineering, including all aspects of engineering .

Requirements of projects, 3D Model designing , Stress Analysis, leading Related disciplines for several consultant Companies in their oil, gas, Petrochemical & water & mineral industries .

Projects. Also familiarity with codes and standards like ASME, ASTM, DIN

Professional Experience

Position : Hormoz Fertilizer Project

2015-present

Company: Petrochemical Industries Development Management co (PIDCO)- PIDEK

Senior Piping Management control(MC)

Position : PARSIAN C2+ RECOVERY & FRACTIONATION PROJECT

2015-present

Company: PALAYESH PARSIAN SEPEHR CO- NECO Industry Management Co

Senior Piping Management control(MC)

Position : PARSIAN C2+ RECOVERY & FRACTIONATION PROJECT

Company: PALAYESH PARSIAN SEPEHR CO- NECO Industry Management Co

2015-present

Senior Piping Management control(MC)

2013 - 2015

Position: Technical Engineering Manager

Company: Near pars-Aban Air cooler

Senior Piping Designer & 3D Model in Project:

Working on piping design of cooling Package in unit132 Phase13 at POGC

Major activity in design:

Nozzle orientation & Ladder & Platform Layout

Updating plot plan according to piping design requirement

Route study & Piping design of cooling Package in unit132 Phase13 at POGC

Check the related U/G layout of unit & specify the position of catch basin & M/H according to the design

Preparing U/G fire water generation drawing & design of A/G to Desalted

Generating Isometric drawing from model

Generating piping arrangement & Equipment drawing with plant wave software

Generating MTO from all consortium models on the 1st, 2nd & 3rd phases of project.

Modeling instruction & Model review

Procedure for all discipline & people in project.

Participate in P&ID Mechanization.

Preparation of single line drawing for steel structures.

Preparation of line list, MTO & Route Study.

Consideration of site TQ and site visit to solve some piping problems.

Preparation of As-Built drawings & correction on PDMS Model.

PDMS Design training for project engineering disciplines.

2012 - 2014

Position: Technical Engineering Manager

Company: Chegalesh-Aban Air cooler

Senior Piping Designer & 3D Model in Project:

Working on piping design of cooling Package in unit132 phase14 at POGC

Major activity in design:

Nozzle orientation & Ladder & Platform Layout

Updating plot plan according to piping design requirement

Route study & Piping design of cooling Package in unit132 at POGC

Check the related U/G layout of unit & specify the position of catch basin & M/H according to the design

Preparing U/G fire water generation drawing & design of A/G to Desalted

Generating Isometric drawing from model

Generating piping arrangement & Equipment drawing with plant wave software

Generating MTO from all consortium models on the 1st, 2nd & 3rd phases of project.

Modeling instruction & Model review

Procedure for all discipline & people in project.

Participate in P&ID Mechanization.

Preparation of single line drawing for steel structures.

Preparation of line list, MTO & Route Study.

Consideration of site TQ and site visit for to solve some piping problems.

Preparation of As-Built drawings & correction on PDMS Model.
PDMS Design training for project engineering disciplines.

Position: Technical Engineering Manager 2013-2015

Company: : Near pars - Aban Air cooler

Senior Stress Analysis:

Working on stress Analysis of cooling Package in unit132 phase13 at POGC

Creating Standard support

Calculations of no loop

Calculation of loop sizing

Stress Analysis of critical line list

Route Study and determine type & Displacement Support

Position: Technical Engineering Manager 2012-2014

Company: Chegalesh - Aban Air cooler

Senior Stress Analysis:

Working on stress Analysis of cooling Package in unit132 phase14 at POGC

Creating Standard support

Calculations of no loop

Calculation of loop sizing

Stress Analysis of critical line list

Route Study and determine type & Displacement Support

Position: Catalogue man 2009-2009

Company: Saff Rosemond

Writing **Catalogue** with Paragon Module from PMS by Engineering Software (P.D.M.S).

Position: Technical Engineering Manager 2012-2014

Company: IOTC

Senior Stress Analysis & 3D Model in Projects

Marine Loading Arm 3D model design by Engineering Software (P.D.M.S) in kharg Island.

Marine Loading Arm Stress Analysis by Engineering Software (CAESAR) in kharg Island .

Generating MTO, Isometric drawing & piping arrangement drawing in the mentioned projects.

Position: Technical Engineering Manager 2011-2012

Company: Hascon Eng s.p.a(Italy co) , Consul MISE co, TAM co

Senior Piping Designer & 3D Model in Projects:

Working on piping design of Bardsir steel Marking plant(Fournace 140 ton EAF+LF&MH)

Established specific Job Specification for Piping (Job Specification Fabrication & Field Installation , ...)

Checked and coordinating Equipment nozzle orientation.

Establish & Setting of admin of project to start modeling of Project by Engineering Software (P.D.M.S).

Writing Catalogue with Paragon Module from PMS by Engineering Software (P.D.M.S).
 Setting of Title Block of project for Isometric & Piping Arrangement generation by Engineering Software (P.D.M.S).
 Modeling instruction & Model review by software(NawisWorks, Review Reality)
 Training and development of subordinate.
 Generating MTO from all consortium models on the 1st, 2nd & 3rd phase of project.
 Generating piping arrangement & Equipment drawing by Engineering Software (Plant Wave).
 Preparation of line list, MTO & Route Study.
 Consideration of site TQ and site visit to solve some piping problems.
 Preparation of As-Built drawings & correction on PDMS Model by Engineering Software (P.D.M.S).
 PDMS Design training of project engineering disciplines.
 Piping technical proposal estimation.(Estimate of weight, cost & preparation of bulk materials)
 Attended technical meeting with clients.
 Checking of Isometric Drawings with respect to P&ID.
 Prepare Bill of Material sheets for each Isometric in the same Drawing.
 Working on Bardsir steel Marking plant's site as piping designer supervisor .

Position: Manager of Design & Engineering

2013-2015

Company: IOTC

Analytical & 3D modeling of Submerging Rotary jet (SRJ)in storage tank in kharg Island.

Position: Manager of Design & Engineering

2011-2013

Company: Esfahan Steel Company (ESCO)- FLS (Denmark co) – JDEVS

Working on piping& Equipment& HVAC& structure design in Dimasus & zinterband in Esfahan steel plants:

Piping Design, Equipment Modeling by Engineering Software (P.D.M.S).
 Modifying Isometric Drawings with respect to P&ID .
 Check and coordination of Equipment nozzle orientation.
 Writing Catalogue with Paragon Module from PMS by Engineering Software (P.D.M.S).
 Check the overall Plot plan & Update Plot plan
 Check the foundation plan of all subcontractors
 Check the U/G layout of project & check the position & clashing with cable or foundation
 Check the Piping routing of all subcontractors & comment them for developing their piping (if necessary)
 Check the nozzle orientation of all sub contractors & comment them. (If necessary)
 Check the piping facility of single line diagram

Position: Manager of Design & Engineering

2011-2013

Company: Esfahan Steel Company (ESCO)- FLS (Denmark co) – JDEVS

Working on piping& Equipment& HVAC& structure design in Dimasus & zinterband in Esfahan steel plants:

Piping Design, Equipment Modeling by Engineering Software (P.D.M.S).
Modifying Isometric Drawings with respect to P&ID .
Check and coordination Equipment nozzle orientation.
Writing Catalogue with Paragon Module from PMS by Engineering Software (P.D.M.S).
Check the overall Plot plan & Update Plot plan
Check the foundation plan of all subcontractors
Check the U/G layout of project & check the position & clashing with cable or foundation
Check the Piping routing of all subcontractors & comment them for developing their piping (if necessary)
Check the nozzle orientation of all sub contractors & comment them. (If necessary)
Check the piping facility of single line diagram

2008-2010

Position: Manager of Design & Engineering

Company: National Iranian Copper Industrial(NICI) - FLS (Denmark co) –JDEVS

Working on piping& Equipment& HVAC& structure design in khatunabad plants:

Piping Designing, Equipment Modeling by Engineering Software (P.D.M.S).
Modifying Isometric Drawings with respect to P&ID .
Check and coordination of Equipment nozzle orientation.
Writing Catalogue with Paragon Module from PMS by Engineering Software (P.D.M.S).
Check the overall Plot plan & Update Plot plan
Check the foundation plan of all subcontractors
Check the U/G layout of project & check the position & clashing with cable or foundation
Check the Piping routing of all subcontractors & comment them for develop their piping (if necessary)
Check the nozzle orientation of all sub contractors & comment them. (If necessary)

2007-2008

Position: Technical Engineering

Company: National Iranian Copper Industrial(NICI) - ACTEA (Italy co) –JDEVS

Working on piping& Equipment& HVAC& structure design in sarcheshmeh Scrubber plants (EPC):

Major activity in design:
Nozzle orientation & Ladder & Platform Layout
Updating plot plan according to piping design requirement
Route study & Piping design in CDU/VDU unit in SAR project
Check the related U/G layout of unit & specify the position of catch basin & M/H according to design
Preparing U/G fire water generation drawing & design of A/G to Desalted
Generating Isometric drawing from model
Generating piping arrangement & Equipment drawing with plant wave software
Participate in P&ID Mechanization.
Preparation of single line drawing for steel structures.
Preparation of line list, MTO & Route Study.

2007-2008

Consideration of site TQ and site visit to solve some piping problems.

Position: Technical Engineering

Company: Tehran Cement- FLS (Denmark co)- JDEVS

Working on piping& Equipment& HVAC& structure design of Line 6 in cement tehran plants:

Piping& HVAC Designing, Equipment Modeling by Engineering Software (P.D.M.S).

Modifying Isometric Drawings with respect to P&ID .

Writing Catalogue with Paragon Module from PMS by Engineering Software (P.D.M.S).

2010-2012

Check the overall Plot plan & Update Plot plan

Position: Manager of Design & Engineering

Company: Margun Cement- FLS (Denmark co)- JDEVS

Working on piping& Equipment& HVAC& structure design of Line6 in cement Margun plants:

Piping& HVAC Designing, Equipment Modeling by Engineering Software (P.D.M.S).

Modifying Isometric Drawings with respect to P&ID .

Writing Catalogue with Paragon Module from PMS by Engineering Software (P.D.M.S).

Check the overall Plot plan & Update Plot plan

Training Course & Certificate:

Training course in FLSmidth/ Airtech (Denmark Country)

2012

Having certificate in PDMS

Having certificate in Catalogue with PDMS

Having certificate in CaesarII

Having certificate in PV Elite

Having certificate in ANSYS

Having certificate in Solis works

Consultant & Part Time Working Experiences:

Piping engineer in Petrotechna CO (Iran Branch). (As a Piping Supervisor Consulter – Part time):

-Working on piping design and equipment design in Desalter of pazananII.

-Calculate of vessel Sizing and sizing in Deslter package(AC/DC&AC)

-Working on price of Desalter package

Piping engineer in Aban Air Cooler(AAC). (As a Piping Supervisor Consulter – Part time):

-Working on piping design of South pars Gas project on phase 13-14 in Assalouieh.

-Working on piping Design as Catalogue man of South pars Gas project on phase 13-14 in Assalouieh.

Piping engineer in Cantigerad CO. (As a Piping Supervisor Consulter – Part time):

-Working on piping design in Air washer of darvaze shemiran subway

Piping engineer in CC ENERGY DEVELOPMENT S.A.L. (Oman Branch)

-Working on piping design

Proposals:

Desalter package in JDEVS
GANjway in IOTC
Loading arm in pars oil Co
Darab Cement Plant
ESP in Nipec,.....
Fabric Filter in & GCT in MArgun Cement,.....

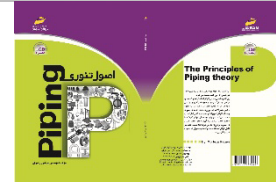
Trainer & Instructor Experiences:

Consultations Piping & PDMS training for Plant Design and CAESARII in Following Companies:

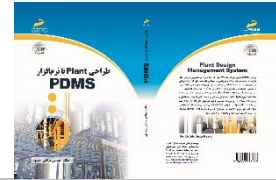
Kermanshah Petrochemical
Jajarm Alumina
Mobin Petrochemical
Mahshahr Tondguyan Petrochemical
Mahshahr Razi Petrochemica
Aban Air Cooler(AAC)
Songun Copper
Sufyan cement
Polyurethane Co
Pars and Oil and Gas Company(POGC)
Rahbaran Petrochemical
Koshavar Tajhiz
Esfehan Steel Co
Iranian oil Pipeline and Telecommunication Co
Abadan Refinery

- Over 4000 Hours Piping Training in mojtime fani Tehran(mft)(A technical college in oil, gas, and petrochemical)
- Over 2000 Hours PDMS Training in mojtime fani Tehran(mft) (A technical college in oil, gas, and petrochemical)
- Over 1000 Hours CAESARII Training in mojtime fani Tehran(mft) (A technical college in oil, gas ,and petrochemical)
- Over 600Hours PDMS Training in Jahad Daneshgahi Amirkabir (A technical college in oil, gas, and petrochemical)
- Over 200 Hours PDMS&CAESARII Training in fellat ghareh Development Indusry (A technical college in oil, gas ,and petrochemical)
- Over 300 Hours Piping& PDMS&CAESARII Training in iust (Science & Technology University)
- Over 50 Hours Piping Training in Novin Parsian (A technical college in oil, gas, and petrochemical)
- Over 600 Hours Piping Training in Jahad Daneshgahi Amirkabir (A technical college in oil, gas, and petrochemical)
- Over 600Hours PDMS Training in Jahad Daneshgahi Amirkabir (A technical college in oil, gas, and petrochemical)
- ✓ **Manager of oil & Gas & Petrochemical Group in MFT**(A technical college in oil, gas, and petrochemical (2010- present)

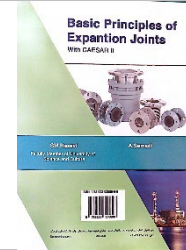
Editor & Printer: **The principles of Piping theory** Dibagaran publication
Piping Theory Book Reference including Material & design&Stress
in Oil, Gas & Petrochemical Plant (Printed in 2012)



Plant Design Management System Dibagaran Publication
PDMS Book Reference for Modeling & design
in Oil, Gas & Petrochemical Plant (Printed in 2014)



Basic Principles of Expansion Joints USC ublication
Basic Principles of Expansion Joints with CAESAR



Article: Exact Vibration and Buckling Solution of Levy Type Initially Stressed Rectangular Thin Plates, 9 September 2013

Multi-criteria optimization of reinforced cylinder using genetic algorithm, December2006

Prediction and optimization of electrical conductivity for polymer-based composites using design of experiment and artificial neural networks

Electrical conductivity enhancement of Carbon/Epoxy composites using nanoparticles

Effect of bending load on the electrical conductivity of carbon/epoxy composites filled with nanoparticles

Exact vibration and buckling solution of levy type initially stressed rectangular thin plates

International Journal of Advanced Design and Manufacturing Technology (ADMT)

Intenational congress on Aerospace Engineering ,(KNTU) Neural Computing and Applications 34 (10), 7653-7671

Journal of Science and Technology of Composites 5 (4), 605-614

Iranian Journal of Polymer Science and Technology 32 (1), 79-92

INTERNATIONAL JOURNAL OF ADVANCED DESIGN AND MANUFACTURING TECHNOLOGY 6 (425 ...

Effect of bending load on electrical conductivity of carbon/epoxy composites filled with nanoparticles using design of experiment and artificial neural networks	Results in Engineering 25, 104174
Investigation of the effect of nanoclay on composite plates under low-speed impact using artificial neural networks	Proceedings of 7th International Conference on Harmony Search, Soft
Effect of the crude oil environment on the electrical conductivity of the epoxy nanocomposites	Advances in Nano Research 15 (4), 285-294
Spur Gear Optimization Using Metaheuristics and Computer Aided Engineering Design	Proceedings of 7th International Conference on Harmony Search, Soft ...
A novel rotary encoder based on De Bruijn sequences for highly precise automation applications	Iranian Journal of Manufacturing Engineering 11 (7), 20-26
Study of Free Vibration Of Multi-span Rectangular Mindlin Plates Using Rayleigh-ritz Method,10 December2007	Intenational congress on Manufacturing Engineering ,(IUST)
Investigations of the Influence of Cutting Parameters on wire Electrode Wear in WEDM, 10 December2007	Intenational congress on Manufacturing Engineering ,(IUST)
Vibration Study of rapping effect in ESP collecting plate, 10 December2007	Intenational congress on Mechanics Engineering ,(IUST)
Exact solution for rectangular plate vibration under primary single and bi-axis planer stress and different impact loading ,17febrarury2009	Annual international conference of iranian aerospace society, (MUT)
Exact solution for rectangular plate vibrations on the elastic restraint under single and bi-axis planer stress and different impact loading , 19 may2009	Intenational conference on mechanical engineering, (UT)
Optimization if vibrative rapping system in the collecting plate of ESP,19 may2009	Intenational conference on mechanical engineering, (UT)
Study on Brownian mixing Effect in nanoparticle suspensions (Nanofluid) Conductivity by Computational Fluid Dynamic Method,7Feb2012	International Conference on nanostructures& anomaterials, (IAUM)
Study on wall/nanoparticle interaction in nanofluidsConvection heat transfer by Computational fluid dynamic method,7Feb2012	International Conference on nanostructures& anomaterials, (IAUM)

Consider submerj rotary jet in Storage tank,15March2012

International Conference
R&D in oil industrials
(NIOC)

Software Skills: PDMS- Catview -CAESARII- PV Elite- Ansys-Solid works

Personal information: Date of Birth: 08/03/1980
Marital status: Married
Military Service: Finished
Gender: Male
Year of Experience: 14 years
