

EXPERIENCE

2020 Northern Bay Ambulance; Pinconning, Michigan

Paramedic

2003-Present M-CRASH Group llc; Bay City, Michigan

Traffic Crash Reconstruction Expert

2012-Present Arenac County Sheriff's Office; Standish, Michigan

Deputy Sheriff

2005-2009 Genesee County Fatal Alcohol Crash Team; Flint, Michigan

Team Commander

Develop FACT program, set equipment standards, develop policies and procedures, develop reporting system, set

budget, general fiscal responsibilities, personnel selection and management, report reviews and approval.

2002-2012 Michigan State Police Third District Headquarters; Saginaw, Michigan

Traffic Crash Reconstruction Specialist

Investigate fatal and serious injury traffic crashes, review serious injury and fatal traffic crash reports, coordinate and instruct District At-Scene Traffic Crash Investigator training, testify as expert witness.

2000-Present Delta Community College; University Center, Michigan

Regional Police Academy Instructor

Develop curriculum and instruct traffic crash investigation to cadets.

2000-2007 Bay Medical Center EMS; Bay City, Michigan

Paramedic

Duties similar to Life Link EMS.

2000-3/2002 Michigan State Police Third District Headquarters; Saginaw, Michigan

District Recruiter

Recruiter covering 12 counties. Duties include PR, high school and college seminars, news interviews, special district projects, public speaking, special event scheduling and organization, physical agility test

proctor.

1999-2007 Michigan State Police Third District

First Aid Instructor

Instruct and evaluate personnel on first aid techniques, policies, and procedures.

1997-5/2002 Michigan State Police Bay City Post; Bay City, Michigan



Trooper

Road patrol duties including complaint work. 1998 received instruction and began investigating traffic traffic crashes as an At Scene Traffic Crash Investigator.

1995-6/1997 Sheriff's Department; Alpena County, Michigan

Deputy Sheriff

Court Officer Duties and Road Patrol Duties including complaint work.

1994-4/1995 E-911 Dispatch Center; Alpena, Michigan

E-911 Telecommunicator

Answer emergency and non-emergency lines, relay messages and needed information to appropriate agencies. Page fire, rescue, and ambulances as well as give limited medical treatment over the phone. Non-emergency law enforcement traffic as well as LEIN and emergency traffic.

1993 Law Enforcement Intern; Lake Superior State University

Intern, Law Enforcement

Ride Along and assist officers in the line of duty. Intern for approximately 300 hours. Demands knowledge of laws and departmental procedures and establishment of trust between self and officer(s).

1992-1999 Long Rapids Fire Department (Volunteer); Lachine, Michigan

Volunteer Rescue Personnel

Operate on board a volunteer rescue unit/first response unit as well as assisting at fires as support personnel. While I was classified as a firefighter near the end of my membership, and while I have the training equivalent to firefighter I & II, I did not test for those certifications.

1990-1999 Onaway Area Ambulance Service; Onaway, Michigan

Volunteer Crew Member

Operate as a volunteer crew member on a Basic Life Support unit. Requires same skills as a Paramedic, in addition it also requires the ability and knowledge to medically evaluate and triage patients to call for Advanced Life Support assistance. Also requires emergency driving techniques, knowledge of EMS laws, and ambulance operations and budgeting.

Supervisor (1993-1997 & 1999)

Supervisor position requires knowledge of EMS operational laws, Medical Control Protocols, budgeting and working within budget constraints, knowledge of communication operations, dealing with governing board, and also requires the ability to look past personal and political agendas to do what's in the best interest of the community the ambulance serves.

1990-1997 Life Link EMS; Rogers City, Michigan

Paramedic

Duties similar to that of Onaway Area Ambulance Service, including good report writing skills and general maintenance of ambulances.

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1990-2010 Michigan High School Athletic Association; East Lansing, Michigan

High School Sports Official

Demands good working knowledge of rules, hand to eye coordination, physical fitness, quick mental processing, good communication skills, interpretation of written rules to fit unusual circumstances, and human relation skills. Currently participate as Basketball Official.

ACCREDITATION/ASSOCIATIONS

2003-present The Accreditation Commission for Traffic Accident Reconstruction (ACTAR) accredited.

COURT TESTIMONY

Since March of 2002 accepted as an expert in the following courts (including but not limited to):

Alpena County District Court **Antrim County Circuit Court** Arenac County Circuit Court Arenac County District Court **Bay County Circuit Court Bay County District Court** Cass County Circuit Court Clare County Circuit Court Genesee County Circuit Court Genesee County District Court Grand Traverse County Circuit Court Gratiot County District Court **Gratiot County Circuit Court** Ingham County District Court Ingham County Circuit Court Isabella County Circuit Court Kent County Circuit Court Lapeer County District Court Macomb County Circuit Court Lapeer County Circuit Court Midland County District Court Midland County Circuit Court Montcalm County Circuit Court Oakland County Circuit Court Ottawa County Circuit Court Presque Isle Circuit Court Saginaw County District Court Saginaw County Circuit Court Sanilac County Circuit Court Tuscola County Circuit Court Tuscola County District Court Washtenaw County Circuit Court Wayne County Circuit Court US District Court Eastern District of Southern Division

EDUCATION

2021	Pediatric	Education	for Pr	ehospital	Professionals	(PEPP)

Northern Bay Ambulance

2020 Cloud Compare; online

Ai2-3D Forensics (6 hours)

2019 Advanced Cardiac Life Support; Pinconning, MI

Northern Bay Ambulance

2019 Pre-Hospital Trauma Life Support; Pinconning, MI

Northern Bay Ambulance (16 hrs)

2019 Advanced Collision Reconstruction with CDR Applications; Frankenmuth, MI

Accident Analysis & Reconstruction, Inc. (40 hrs)

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2019	Pediatric Education for Prehospital Professionals; Pinconning, MI Bob Loiselle, MA, NRP, EMSIC, I/C #505443
2019	Crush Energy Analysis in Collision Reconstruction; Frankenmuth, MI Accident Analysis & Reconstruction, Inc. (40 hrs)
2016	WREX2016; Orlando Florida Traffic Crash Reconstruction Seminar
2014	Pennsylvania State Police; Pennsylvania State College Traffic Crash Reconstruction Seminar
2014	Michigan Department of Transportation (USDOT/FHA), Lansing, MI Traffic Incident Management Instructor training (10 hours)
2014	McLaren Bay Region; Bay City, MI Pre-Hospital Trauma Life Support (two days)
2013	Michigan State Police; Grand Blanc, MI Datamaster Update
2012	Pennsylvania State Police; Pennsylvania State College Traffic Crash Reconstruction Seminar
2012	Occupant Kinematics for the Traffic Crash Reconstruction Expert; Wyandotte, MI IPTM, (40 hours)
2011	Crash Data Retrieval Update; Flint, MI General Motors Corp (24 hours)
2011	Precision Immobilization Technique, Lansing, MI Michigan State Police, Training Division, Drive Track
2010	DeChant Consulting Services; Wyandotte, MI iWitness Training (40 hours)
2010	Road Safety Audit; Gaylord, MI Michigan Department of Transportation (one day)
2009	ARAS 360 Reconstruction Software; Kamloops, British Columbia, Canada ARAS 360 (24 hours)
2009	DeChant Consulting Services; Saginaw, MI iWitness Training (24 hours)
2009	Institute of Police Technology & Management; Grand Blanc, Michigan Energy Methods & Damage Analysis in Traffic Crash Reconstruction (40 hours)
2009	Ohio State Highway Patrol; Columbus, Ohio

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	Advanced Motorcycle Collision Investigation (40 hours)
2008	Schmidt Consulting Services LLC; Escanaba, Michigan Applied Physics for Accident Reconstruction (40 hours)
2008	Institute of Police Technology & Management; Grand Blanc, Michigan Car Pedestrian Crash Investigation (40 hours)
2008	Michigan State Police; Mt. Pleasant, Michigan Small Squad Tactics in Riot Control (2 days)
2008	Michigan State Police; Higgins Lake, Michigan Mapscenes Update, 35 hours
2007	Collision Safety Institute; Lansing, Michigan Crash Data Retrieval System Analyst Course (32 hours)
2007	Vericom Computers Inc; Chesterfield, Michigan Acceleration & Vericom Familiarization (12 hours)
2006	Michigan State Police; Lansing, Michigan Precision Immobilization Technique (12 hours)
2006	Pennsylvania State Police; Pennsylvania State College Traffic Crash Reconstruction Seminar
2006	Illinois Association of Traffic Crash Investigators; Bloomington, Illinois Traffic Crash Reconstruction Conference
2005	Michigan State Police; Troy, Michigan Unified Incident Command System (16 hours)
2005	Michigan State Police; Troy, Michigan Hazardous Materials First Responder Operations (24 hours)
2004	Collision Safety Institute; Lansing, Michigan Crash Data Retrieval System SDM/CDR download (24 hours)
2004	Pennsylvania State Police; State College, Pennsylvania Training seminar, three days
2004	Northcoast Polytechnic; Westlake Rec Center, Westlake, Ohio Biomechanics, including Low Speed Crashes (40 hours)
2004	Michigan State Police; MSP Forensic Laboratory, Lansing, Michigan Breath Test Operator Update, Class IV operators
2003	Institute of Police Technology and Management; MSP Training Academy, Lansing, Michigan Human Factors in Traffic Crashes (40 hours)

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2003	Bay Regional Medical Center EMS; Bay City, Michigan Prehospital Trauma Life Support (16 hours)
2003	Breath Test Operator Class IV (Datamaster Instructor, PBT Instructor, PBT Calibration) training
2003	Breath Test Operator Class IIIA (PBT Instructor/calibration) training
2003	Michigan State Police/Red Cross First Aid Refresher (16 hours)
2002	Institute of Police Technology and Management; Eugene, Oregon Bicycle/Pedestrian Motor Vehicle Crashes (40 hours)
2002	Michigan State University/Delta College; Bay City, Michigan AI-3 Accident Photography (16 hours)
2002	Bay Medical Center EMS; Bay City, Michigan American Academy of Pediatrics/Pediatric Education for Prehospital Professionals (PALS) (16 hours)
2002	Safety Solutions; Santa Rosa, California Commercial Motor Vehicle Accident Investigation (40 hours)
2002	Michigan Association of Traffic Accident Investigators (MATAI); East Lansing, Michigan Conference (8 hours)
2002	Institute of Police Technology and Management/Palm Beach Community College; Lake Worth, Florida Motorcycle Accident Investigation (40 hours)
2002	Michigan State Police/Richmond Post; Richmond, Michigan Forensic Mapping CAD/MapScene software training (24 hours)
2002	Institute of Police Technology and Management; Indianapolis, Indiana Traffic Crash Reconstruction (80 hours)
2002	Delta Community College; University Center, Michigan Brakes program
2002	Norfolk Southern Railroad Police; Taylor, Michigan Railroad Crash Investigation (24 hours)
2002	Delta Community College; University Center, Michigan Intro to Automotive and Automotive Electronics
2002	Michigan State Police/Richmond Post; Richmond, Michigan Forensic Mapping/Total Station training (40 hours)
2002	Michigan State University; East Lansing, Michigan AI-9 Accident Reconstruction (80 hours)

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2002	Michigan State Police/Red Cross First Aid Refresher (16 hours)
2001	Michigan State University/Macomb Community College; Macomb, Michigan AI-4 Accident Investigation- Perspective Grid Mapping (8 hours)
2001	Michigan State University/Schoolcraft College; Garden City, Michigan AI-5 Accident Investigation-Tire Examination (8 hours)
2001	Michigan State University/Schoolcraft College; Garden City, Michigan AI-6 Accident Investigation-Lamp Examination (8 hours)
2001	Michigan State University/Oakland Community College; Auburn Hills, Michigan AI-7 Accident Investigation-Commercial Motor Vehicle (40 hours)
2001	Michigan State University/Oakland Community College; Auburn Hills, Michigan AI-8 Accident Investigation-Motorcycle (16 hours)
2001	Michigan State Police/Red Cross First Aid Refresher (16 hours)
2001	Michigan State Police/Bay Medical Center; Bay City, Michigan EMS Crime Scene Response
2001	Michigan State Police/Delta Community College; Bay City, Michigan Third District Headquarters-Command Issues during Riot Control
2000	Michigan State Police/Red Cross First Aid Refresher (16 hours)
2000	Michigan State Police/Third District; Saginaw, Michigan Traffic Crash Investigation Update (6 hours)
1999	Michigan State Police Training Academy; Lansing, Michigan Laser speed measurement instructor.
1999	Michigan State Police Training Academy; Lansing, Michigan MSP First Aid Instructor/Red Cross instructor (40 hours)
1999	Delta Community College/CSX Railroad Police; Saginaw, Michigan Railroad Grade Collision (8 hours)
1999	Michigan State Police Training Academy; Lansing, Michigan 5 Year Advanced Trooper School (36 hours)
1998	Michigan State Police Training Academy; Lansing, Michigan Basic Radar School MCOLES Certified Radar Operator
1998	Michigan State Police Training Academy; Lansing, Michigan At Scene Traffic Crash Investigation/Advanced Accident investigator (80 hours)
1998	Michigan State Police Training Academy; Lansing, Michigan
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	Advanced Trooper School (76 hours)
1998	Michigan State Police Training Academy; Lansing, Michigan Mobile Videotaping/In Car Cameras (6 hours)
1997	Michigan State Police Training Academy; Lansing, Michigan 18 Week Training Academy (494 hours)
1997	Alpena Community College; Alpena, Michigan DWI Detection/Standardized Field Sobriety Testing including HGN (21 hours)
1996	Grayling National Guard/MSP; Grayling, Michigan Infrared Breath Test/Datamaster (6 hours) Certified Datamaster Operator #16357
1995	Padi/Thunder Bay Divers; Alpena, Michigan Open Water Diver Certification
1994	Kirkland Community College; Roscommon, Michigan MLEOTC recertification course (40 hours)
1994	Delta Community College/Alpena Community College; Alpena, Michigan E-911 Telecommunicator Training class (80 hours)
1994	Michigan State Police Academy; Lansing, Michigan Basic LEIN Training Certificate Received
1993	Life Link EMS; Rogers City, Michigan Advanced Cardiac Life Support (ACLS) 2002 Recertified ACLS at Mobile Medical Response EMS in Saginaw, Michigan
1993	Lake Superior State University; Sault Ste Marie, Michigan B.S. Degree in Criminal Justice/Public Safety (440 hours MLEOTC) Degree Received
1992	Cheboygan Life Support, Inc.; Cheboygan, Michigan Advanced Emergency Medical Technician/Paramedic
1991	Lake Superior State University; Sault Ste Marie, Michigan Emergency Medical Technician/EMT

EDUCATION BACKGROUND

Criminal Justice

LSSU

Juvenile Justice- Understanding and controlling behavior of juveniles. Principals of Behavior Personal Behavior Abnormal Behavior

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Police Process- Proactive Police Management.

Criminal Law, Search and Seizure

Procedural Criminal Law

Substantive Criminal Law

Introduction to Criminal Justice

Ethical Issues in Public Safety

Criminal Investigation: Crime Scenes, Child Abuse, Evidence Collection, Photography, Deaths, Sex Crimes.

Police Operations I & II- Dealing with every day police duties, traffic stops, accident investigations,

emergency driving, communications, dealing with the public, officer safety.

Police Operations Lab- Self defense tactics, PPCT, soft impact weapons, officer safety.

Crisis Intervention and Deviant Behavior

Criminalistics- Advanced Investigation Procedures

MSP

Interview & Interrogation, Witness Interviewing, SCAN Technique

Firearms Training and Advanced Firearm Training.

Traffic Crash Investigation

Narcotics, Dangerous Drugs, & Drug Interdiction Training

Radar Training and Certification

OUIL Enforcement

Patrols and Patrol Issues/Techniques

Firearms Training

Report Writing

Driving; Defensive, Offensive, and Pursuit.

Handling Abnormal Persons

Civil Disorders, Emergency Preparedness/Disaster Control, Tactical Operations

Criminal Investigation; crime scenes, death, sexual crimes; homicides

Juvenile Investigations

Advanced Auto Theft Investigations

Fire Sciences

LSSU

Introduction to Fire Science

Hazardous Materials I

Hazardous Materials II

Hazardous Materials III- Including arson investigation.

Tactics and Strategy on the Fire Ground

Fire Protection and Hydraulics

Industrial Fire Protection

Incident Analysis- Scene Command, Incident Command Systems.

Misc

Driving fire apparatus @ Onaway Fire Department

Applied Health/EMS

LSSU

American Red Cross First Aid Human Anatomy and Physiology

Misc.

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Driving, Offensive and Defensive; two courses through EMS employment

MSP

Red Cross Instructor

Professional Rescuer CPR

AED

Oxygen Administration

Blood Pressure

Emergency Response R97

Community First Aid

Workplace First Aid

Red Cross Lifeguard Training

PRESENTATION & INSTRUCTION

2019 MASSTrans Annual Transit Training Conference for Frontline Employees - Crash Investigation

2018 Oakland County Bar Association, Criminal Brown Bag Seminar

2018 Presentation to Pioneer Insurance, Flint, MI

2017 MASSTrans 14th Annual Transit Training Conference for Frontline Employees - Crash Investigation

WREX2016 Low speed testing/damage analysis

Two national webinar presentations on Photogrammetry for NHTSA in 2015 (5-5-& 12-16-15)

Instruct Total Station/Forensic Mapping class at Delta Community College 2014

Instruct iWitness photogrammetry to St. Clair County Sheriff's Office 2014

Instruct annual Michigan State Police First Aid refresher 1999-2007.

Presentation to Freeland High School Forensics class reference traffic crash investigation.

Presentation to JC Johnson employees reference the effects of drugs and alcohol on driving capabilities.

Presentations to drivers education programs on the effects of drugs and alcohol on driving capabilities, the use of seat belts and related injuries, and the effects of speed in crashes.

Presentation to Michigan Drivers Educators group on the importance of proper driver education to first time drivers and the effects of drugs and alcohol on driving capabilities.

Presentation to Bay Medical Center-EMS EMT and MFR classes about the legality of using emergency driving status and the effects of speed in crashes. (multiple presentations)

Presentation to Michigan Association of Medical Examiners Conference

Presentation to Oakland County Prosecutor's Office

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Instruct police officers in total station scene documentation and CAD drawing since 2005.

Bay City, MI Alpena, MI Presque County, MI Saginaw, MI

Canton, MI Macomb County, MI
Grand Rapids, MI Muskegon, MI
Greater Chicago Area, IL Jackson Hole, WY
Creater Charlend area OH Western IN

Greater Cleveland area, OH Warsaw, IN Plymouth, IN Charlevoix, MI

St. Joseph County, IN

Traffic Incident Management Seminars with Michigan Department of Transportation

Lansing, MI 2011 Pinconning, MI 2011
Zilwaukee, MI 2012 Petoskey, MI 2012
Saginaw, MI 2011 Alpena, MI 2012
Farwell, MI 2013 Harrison, MI 2013
Birch Run, MI 2013 Saginaw Twp, 2014
Traverse City, MI 2014 Sharp2 Train the Trainer class

Bay City, MI 2016

Present with Genesee County Community Mental Health in Washington DC on alcohol, drugs, and the community impact 2009.

Assist MDOT with Road Safety Audits

Presentation webinar with USDOT and MDOT on quick clearance and photogrammetry 2013

Presentation webinar with USDOT and NHTSA on Crash Reconstruction Best Practices and photogrammetry May 2015.

Presentation webinar with USDOT and NHTSA on Crash Reconstruction Best Practices and photogrammetry Dec 2015.

TRAFFIC CRASH STUDIES

Drag Factor studies considering the following factors: Safe + Sled commercial drag sled, skid tests, Vericom 3000 with both ABS & non-ABS braking on asphalt & gravel surfaces.

Drag Factor studies considering the following factors: drag tire, Vericom 3000, G Analyzer, bumper guns, skid tests, and standard braking vs. anti-lock braking systems.

Drag Factor studies considering the following factors: Vericom 3000, skid tests, and aftermarket traction devices as they apply to snowmobiles.

Drag Factor testing confirming the accuracy of the SAFE Mass Load Drag Sled as compared to the Vericom 3000, Vericom 200, and conventional hand measurements and calculations of skid marks at known speeds.

Comparative analysis of total stations; specifically a NPL Nikon, a Sokkia 530R, and a LTI 20/20 with angle encoder.

2006 Vault testing with MSP Reconstruction group in Escanaba, MI

Comparison of total station and iWitness photogrammetry.

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SPECIAL PROJECTS

2013- Requested to be on the Governor's Traffic Safety Advisory Committee on Traffic Incident Management.

2008 - 2010 Worked with Genesee County Community Mental Health on reducing underage drinking as well as fatal crashes involving alcohol and drugs. My responsibilities include forming a plan and related procedures for coordinated OWI and LCC enforcement, budgeting of overtime, scheduling patrols and inspections among numerous police agencies participating, and gathering and conducting a statistical analysis to evaluate the program's success.

2005 -2009 Formulated and initiated Genesee County's Fatal Alcohol Crash Team concept. Responsible for all facets of budget issues; equipment specifications and purchasing; team member qualifications, selection, and management; scene supervision; report format, review, and supervision; report system specifications; general management and fiscal responsibilities.

2001 Assisting Alpena County Sheriff's Department in development, and implementation of a grant writing to purchase a lidar unit for speed measurement and AI distance measurements. Continued project by training 5 departments in its utilization for mutual aid agreements.

2001 Initiated an AED grant for MSP Third District. Grant was approved for providing 55 AED's and 7 trainer units to 14 police agencies covering 7 counties. Coordinated and instructed training offered to all 14 agencies.

1993 Initiated a plan to upgrade Onaway Area Ambulance Service from a volunteer BLS system to a volunteer BLS with full time ALS system. Included initiating billing for services, upgrading EMS units, purchasing a new building, hiring staff, creating policies and procedures, and all facets of EMS management.

SENIOR THESIS

Focusing on the implementation of combined emergency services (public safety department) within one department and how this reduces financial concerns, increases communications, decreases response times, and increases public safety, among other issues. Implementation includes cross training of police and fire personnel while reducing the amount of personnel needed to provide appropriate services while continuing, if not increasing, the level of financial security and safety the citizens currently enjoy.

