

# Ethics and Artificial Intelligence (AI)

GW-25th Annual Mid-Atlantic Rehabilitation Counseling Symposium

March 21, 2025





## Who are we?

Rob Froehlich, Ed.D., LPC, CRC

Previous Chair of the CRCC Ethics Committee

Nichole Tichy, Ph.D., CRC

Current member of the CRCC Ethics Committee



## Today's Learning Objectives

Understand Ethical Principles in Al for Vocational Rehabilitation: Identify key ethical considerations surrounding the use of Artificial Intelligence in vocational rehabilitation, including privacy, informed consent, bias mitigation, and data security.

**Evaluate the Impact of AI on Counselor-Client Relationships:** Analyze how AI-driven tools can influence decision-making, client autonomy, and equitable access to services while maintaining professional integrity and ethical counseling practices.

**Apply Ethical Decision-Making Frameworks to Al Integration:** Develop strategies for responsibly incorporating Al technologies into vocational rehabilitation practices, ensuring compliance with ethical standards and legal regulations, and promoting positive client outcomes.



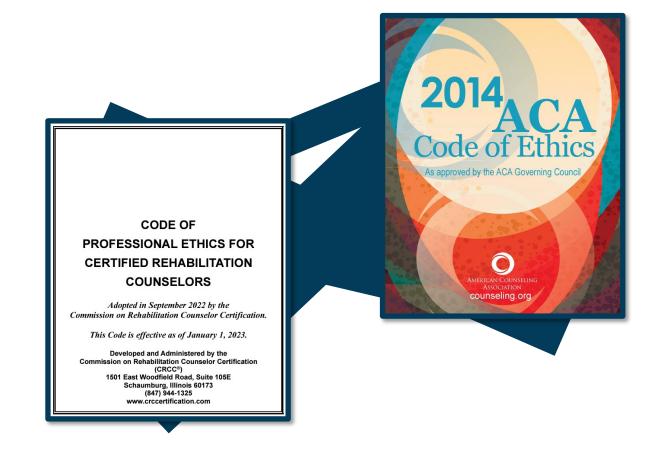
## Codes of Ethics and Technology Guidance

### CRCC – Revised 2023

 Code of Ethics for Certified Rehabilitation Counselors

### ACA - 2014 Revision

American Counseling
 Association Code of Ethics





### Relevant Sections of the Code

## Section B: Confidentiality, Privileged Communication, and Privacy

### **Section E: Professional Responsibility**

- E.1.a. Boundaries of competence
- E.1.b. New Specialty Areas of Practice
- E.1.d. Avoiding Harm
- E.1.g. Continuing Education

## Section K: Technology, Social Media, and Virtual Counseling

- K.1. Competence and Legal Considerations
- K.2. Accessibility
- K.3. Confidentiality and Disclosure

### **Section M: Resolving Ethical Issues**

- M.1. Knowledge of Ethical Standards and the Law
- M.2. Addressing Suspected Violations
- M.3. Conduct in Addressing Ethical Issues



## Importance of Ethical Decision-Making

**Ethical decision-making** is the process of evaluating and choosing among alternatives in a manner consistent with ethical principles.

### Involves:

- recognizing and analyzing ethical dilemmas
- applying professional and moral standards and
- selecting actions that align with values
- Ensures that the well-being of clients is prioritized while adhering to legal and organizational guidelines.



## **Professional Responsibility**

- The Code of Ethics cannot always address emerging topics.
  - E.g., Use of AI is not currently in the Code

### **E.1.** PROFESSIONAL COMPETENCE

- a. Boundaries of Competence
- b. New Specialty areas of Practice
- d. Avoiding Harm
- g. Continuing Education



## Reminder: Ethical Principles

**Autonomy:** To respect the rights of clients to be self-governing within their social and cultural framework.

Beneficence: To do good to others; to promote the well-being of clients.

**Fidelity:** To be faithful; to keep promises and honor the trust placed in CRCs/CCRCs.

**Justice:** To be fair in the treatment of all clients; to provide appropriate services to all.

**Nonmaleficence:** To do no harm to others.

Veracity: To be honest and truthful.





Now that we have some decision-making tools...

What is artificial intelligence?



## Complex Answer

**Artificial Intelligence (AI)** is a branch of computer science focused on creating systems capable of performing tasks that typically require human intelligence.

These tasks include learning, reasoning, problem-solving, understanding natural language, perception, and decision-making.

 Basically, it's math. It's a series of linear regression utilizing predictive analytics to analyze patterns to predict relevant information.



## More Buzz Words – Machine Learning

A more complicated aspect of **AI** is the use of machine learning – which enables systems to learn and improve from experience without being explicitly programmed.

- Three different types:
  - Supervised\*\*
  - Unsupervised
  - Reinforcement



## **Supervised Learning**

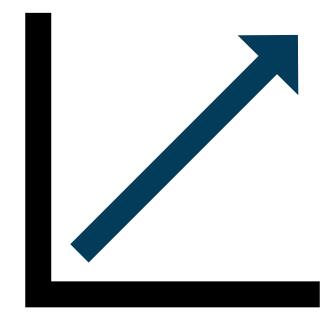
### Most commonly used:

A technique that uses labeled data to train algorithms to recognize patterns and predict outcomes. The goal is to create a model that can predict future data

Again, it's math - you enter an input x and receive an output of y

### **Example:** Spam Filters

 your input is the e-mail, and the output is binary (spam or not spam)





## Natural Language Processing (NLP)

Branch of **Artificial Intelligence (AI)** that enables computers to understand, interpret, and generate human language.

Combines linguistics, machine learning, and deep learning to process text and speech data

### **Key Steps:**

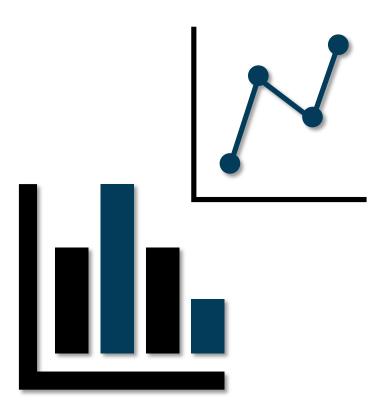
- Understanding text
- Analyzing text
- Processing meaning
- Generating responses

**Example:** The app **Mindstrong** assesses smartphone usage patterns (typing speed, text structure) to predict mental health fluctuations.



## **Useful Applications**

- Assessment and Evaluation Tools
- Personalized Vocational Planning
- Assistive Technology and Accessibility
- Mental Health and Psychosocial Support
- Data-Driven Program Evaluation





## **Platforms**

### **Different Types of Platforms**

- Natural Language Processing (NLP) Tools
  - ChatGPT
  - Grammarly
- Speech Recognition and Voice AI
  - Amazon Alexa
  - Otter.ai
- Predictive Analytics
  - Tableau Al

- Smart Assistants
  - Apple Intelligence
  - Google Assistant
  - Microsoft Copilot
- Specialized AI tools
  - Goblin Tools



## **Ethical Implications**

\*\*\*Remember\*\*\* AI **DOES NOT** replace the professional and clinical judgement of the counselor.

While AI can enhance service delivery, it's essential to address:

- Data Privacy and Confidentiality
- Algorithmic Bias
- Client Autonomy
- Competence and Professional Usage of Technology

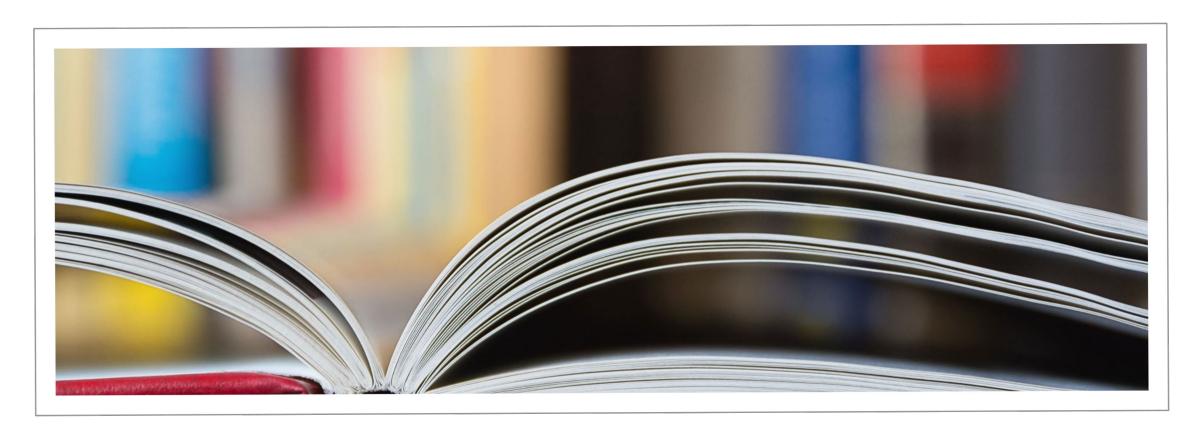


## **Pondering Thoughts**

- Just because something can be done...doesn't mean it should.
- Don't be afraid but proceed with caution.
- It's not all bad or all good.
- A good analogy for where we are with AI is where we as a field have been and how we have developed secondary to social media.
- Initially the field's response was not now not ever...
- But as the world has evolved so has the code.
- Focus has changed to include the use of critical thinking and decisionmaking models to make a choice to use or to avoid.







Is there existing literature or resources on this topic?



## Artificial intelligence in positive mental health: a narrative review (Thakkar, Gupta, & De Sousa, 2024)

- Discusses Al's applications in psychiatric disorders, emotional regulation, diagnosis, and intervention while also addressing ethical concerns.
- Traces Al's history from early theoretical developments to modern applications.
- Provides a robust overview of Artificial Intelligence and its application to mental health care



## Outcomes in Mental Health Counseling From Conversational Content With Transformer-Based Machine Learning (Imel et al., 2024)

- Explores use of transformer-based machine learning models to evaluate conversational content in asynchronous text-based mental health counseling (TalkSpace) and its association with client outcomes
- Data Source: The study used de-identified data from TalkSpace, covering counseling sessions from 2014 to 2019.
  - Participants:166,644 clients
  - 4973 licensed therapists
  - 20,600,274 messages exchanged
  - Clients primarily aged **26-35** (55.4%), predominantly female (75.23%), and mainly White (61.8%).



## Artificial Intelligence for Psychotherapy: A Review of the Current State and Future Directions (Beg, et al., 2024)

- Literature review to review roles of AI in psychotherapy
  - PRISMA guidelines (January 2009 December 2023) = 28 studies

### Key Themes:

- Effectiveness of AI chatbots and iCBT have shown promise in treating anxiety and depression
- Types of AI
  - **Deep learning** identifying patterns for diagnosis
  - Natural Language Processing analyze human speech and text
- Benefits of Al Integration Accessibility and Scalability
- Challenges and Ethical concerns Data privacy and security, lack of empathy



## ACA: Al Work Group Recommendations for Counselors

- Learn more about the essentials of artificial intelligence, its subfields, and its applications to mental health.
- Stay open, informed, and educated.
- Avoid over-reliance on Al.
- Recognize that AI may contain bias and be capable of discrimination.
- Career counselors and those who address employment issues should stay informed about how automation is shaping the world of work.
- Advocate for transparency in Al algorithms.
- Maintain transparency and informed consent.

- Leverage AI for data-driven insights.
- Ensure data security and privacy.
- Counselors should empower clients to communicate about their Al use.
- Supervisors can use AI to enhance the development of supervisees.
- Counselors must understand the limitations of Al in diagnosis and assessment in all counseling settings.
- Consider conducting research on the intersection of AI and counseling.

Recommendations For Client Use and Caution of Artificial Intelligence



# What are some examples we can use?



# Al Use in Vocational Rehabilitation Counseling

**Scenario:** A vocational rehabilitation (VR) counselor is assisting a client diagnosed with Generalized Anxiety Disorder (GAD) who struggles with decision-making, time management, and workplace social interactions. The client is seeking a remote job to help manage anxiety while maintaining productivity.

To provide personalized and ethical support, the counselor integrates AI tools such as:

- Goblin Tools (Al-powered executive functioning support)
- ChatGPT (Career coaching & interview preparation)
- SARAworks (Client communication and compliance automation)



### **Ethical Use in this Scenario**

### Personalized Al Support While Maintaining Human Oversight

- Collaborate with the client to use Goblin Tools,
- SARAworks reduces administrative burdens

### **Ensuring Data Privacy & Informed Consent**

- The client consents before inputting any personal details into Al tools.
- ChatGPT is used in an anonymized way
- The counselor educates the client on Al limitations and data security risks, helping them make informed choices about which tools to use.

### Addressing Al Bias & Promoting Equitable Opportunities

 The counselor reviews Al-generated job suggestions for any biases

### **Supporting, Not Replacing, Human Judgment**

- ChatGPT is used for mock interviews, helping the client prepare answers for anxiety-provoking workplace scenarios. However, the counselor provides direct coaching on emotional regulation and confidence-building.
- Al tools are complementary resources, not replacements for the counselor's clinical expertise in anxiety management.

### **Promoting Transparency & Client Autonomy**

- The counselor explains how Al tools generate recommendations, ensuring the client understands the reasoning behind suggestions.
- The client has full control over which Al recommendations to implement, reinforcing self-determination and confidence in decision-making.



### **Unethical Use in this Scenario**

#### **Violating Data Privacy & Confidentiality**

- inputting personal and medical details into an unsecured
   Al system without anonymization or consent
- Why It's Unethical?
- → Breach of confidentiality and potential HIPAA violations by sharing protected health information (PHI) without consent.

### **Replacing Human Judgment with AI Decisions**

- Relying solely on Al-generated job suggestions, not considering the client's preferences, workplace culture needs, or coping strategies.
- Why It's Unethical?
- → Al is used as a substitute for counselor expertise, removing human insight and reducing client autonomy in vocational decision-making.

#### Al Bias & Discriminatory Job Recommendations

- The job-matching Al filters out high-responsibility positions because of the client's anxiety diagnosis, reinforcing stigma and bias.
- Why It's Unethical?
- → Al perpetuates **bias and discrimination** against individuals with mental health conditions, limiting **equal opportunities**.

### **Lack of Transparency & Informed Consent**

- Failing to explain how Al systems generate
   recommendations, leaving the client unaware of why certain
  jobs are suggested or excluded.
- Why It's Unethical?
- → Clients must have **full transparency** in Al-driven decisions affecting their career and privacy.



### Al in Vocational Rehabilitation Counseling

Sara is a client communication hub designed to improve efficiency in human services, including Vocational Rehabilitation (VR), by automating communication, scheduling, and compliance-related tasks.

### **Saraworks**

#### **Key Features:**

- Communication: Centralized platform for text, email, video calls, and electronic signatures.
- Compliance: Automated case notes and document exchange integrated with major CMS platforms to ensure regulatory compliance.
- Scheduling: Client self-scheduling and automated reminders to streamline service delivery.
- Automation: Workflow templates and bulk outreach capabilities to enhance caseworker efficiency.
- Benefits for VR Agencies:
  - Reduces administrative burdens, allowing counselors to focus on client needs.
  - Ensures compliance with state and federal regulations (e.g., HIPAA, NIST 800-53).
  - Improves client engagement through real-time communication and accessibility.

- **Security:** Hosted on secure, FedRAMP-approved AWS GovCloud, ensuring high data protection standards.
- Applications in Vocational Rehabilitation:
  - Supports high caseloads by automating repetitive tasks.
  - Enhances client outcomes through better communication and streamlined service delivery.
  - Enables VR counselors to focus on personalized service rather than administrative overhead.



## Beyond VR Tools and Al

- Al to get ahead in school
- Grief Bots/Ghost Bots
- Relationship or sexual role-playing Al platforms





## Al and Accessibility Considerations

This too is a mixed bag that requires some decision making:

#### **Positives:**

- Can be used as a tool for individuals who have a difficult time picking up on social cues or context
  - Ex: "Take this response and make it empathic."
- Al in education could assist students with disabilities with note-taking.

### Challenges:

- Al screening can screen out individuals who should actually be screened in regarding employment. (ATS or Applicant Tracking Systems);
- If Al is recording lectures to create notes, that raises potential concerns for faculty members regarding consent



## Questions?





## Thank you!

Dr. Froehlich

rfro@gwu.edu

(202)994-7126

**Dr. Tichy** 

nbean2@email.gwu.edu



