**MODUL 5**

**KONVERSI DIAGRAM KELAS KE KODE**

**PEMROGRAMAN BERORIENTASI OBJECT**

**Seluruh file pada praktikum ini dapat diakses pada:** <https://github.com/afrzl/Pemrograman-Berorientasi-Objek/tree/main/Week%205/Praktikum>

1. Abstract Orang

import java.time.LocalDate;

*/\*\**

*\* Orang*

*\*/*

public abstract class Orang {

  private String nama;

  private LocalDate tanggalLahir;

  public **Orang**(String *nama*, LocalDate *tanggalLahir*) {

    this.nama = *nama*;

    this.tanggalLahir = *tanggalLahir*;

  }

  public String **getNama**() {

    return nama;

  }

  public void **setNama**(String *nama*) {

    this.nama = *nama*;

  }

  public String **getNamaPanggilan**() {

    return nama.**substring**(0, Math.**min**(nama.**length**(), 3));

  }

}

1. Interface Dosen

*/\*\**

*\* Dosen*

*\*/*

public interface Dosen {

  String **getNIDN**();

  void **setNIDN**(String *NIDN*);

  String **getKeahlian**();

  String **getPekerjaan**();

  void **setKeahlian**(String *keahlian*);

}

1. Class Pegawai

import java.time.LocalDate;

*/\*\**

*\* Pegawai*

*\*/*

public class Pegawai extends Orang implements Dosen {

  private String NIP;

  private String kantor;

  private String unitKerja;

  private String NIDN;

  private String kelompokKeahlian;

  public **Pegawai**(

    String *nama*,

    LocalDate *tanggalLahir*,

    String *NIP*,

    String *kantor*,

    String *unitKerja*,

    String *NIDN*,

    String *kelompokKeahlian*

  ) {

    super(*nama*, *tanggalLahir*);

    this.NIP = *NIP*;

    this.kantor = *kantor*;

    this.unitKerja = *unitKerja*;

    this.NIDN = *NIDN*;

    this.kelompokKeahlian = *kelompokKeahlian*;

  }

  public String **getNIP**() {

    return NIP;

  }

  public String **getKantor**() {

    return kantor;

  }

  public void **setNIP**(String *NIP*) {

    this.NIP = *NIP*;

  }

  public void **setKantor**(String *kantor*) {

    this.kantor = *kantor*;

  }

  @Override

  public String **getNIDN**() {

    return NIDN;

  }

  @Override

  public void **setNIDN**(String *NIDN*) {

    this.NIDN = *NIDN*;

  }

  @Override

  public String **getKeahlian**() {

    return kelompokKeahlian;

  }

  @Override

  public String **getPekerjaan**() {

    return "mengajar";

  }

  @Override

  public void **setKeahlian**(String *keahlian*) {

    kelompokKeahlian = *keahlian*;

  }

}

1. Class Programmer

import java.time.LocalDate;

*/\*\**

*\* Programmer*

*\*/*

public class Programmer extends Pegawai {

  String bahasaPemrograman;

  String platform;

  public **Programmer**(

    String *nama*,

    LocalDate *tanggalLahir*,

    String *NIP*,

    String *kantor*,

    String *unitKerja*,

    String *NIDN*,

    String *kelompokKeahlian*,

    String *bahasaPemrograman*,

    String *platform*

  ) {

    super(*nama*, *tanggalLahir*, *NIP*, *kantor*, *unitKerja*, *NIDN*, *kelompokKeahlian*);

    this.bahasaPemrograman = *bahasaPemrograman*;

    this.platform = *platform*;

  }

  public String **getBahasaPemrograman**() {

    return bahasaPemrograman;

  }

  public void **setBahasaPemrograman**(String *bahasaPemrograman*) {

    this.bahasaPemrograman = *bahasaPemrograman*;

  }

  public String **getPlatform**() {

    return platform;

  }

  @Override

  public String **getPekerjaan**() {

    return "Coding all along day";

  }

  public void **setPlatform**(String *platform*) {

    this.platform = *platform*;

  }

}

1. Class MainTest

import java.time.LocalDate;

*/\*\**

*\* MainTest*

*\*/*

public class MainTest {

  public static void **main**(String[] *args*) {

    Pegawai aku = new **Pegawai**(

      "aku",

      LocalDate.**of**(2003, 6, 5),

      "123456",

      "Polstat STIS",

      "BAU",

      "555555",

      "Ngoding"

    );

    System.out.**println**(

      "Object Pegawai:\nNama: " +

      aku.**getNama**() +

      "\nNama Panggilan: " +

      aku.**getNamaPanggilan**() +

      "\nNIP:" +

      aku.**getNIP**() +

      "\nKantor: " +

      aku.**getKantor**() +

      "\nPekerjaan: " +

      aku.**getPekerjaan**()

    );

    Programmer kamu = new **Programmer**(

      "kamu",

      LocalDate.**now**(),

      "111111",

      "Politeknik Statistika STIS",

      "Unit TI",

      "123123123",

      "Ngoding",

      "Java",

      "Mobile"

    );

    System.out.**println**(

      "\nObject Programmer:\nNama: " +

      kamu.**getNama**() +

      "\nNama Panggilan: " +

      kamu.**getNamaPanggilan**() +

      "\nNIP:" +

      kamu.**getNIP**() +

      "\nKantor: " +

      kamu.**getKantor**() +

      "\nPekerjaan: " +

      kamu.**getPekerjaan**() +

      "\nBahasa Pemrograman: " +

      kamu.**getBahasaPemrograman**() +

      "\nPlatform: " +

      kamu.**getPlatform**()

    );

  }

}

1. Output

