

## **ausführliche Dokumentation, Stand: 26.11.00**

### **Class Name:**

Person

Category: Logical View

Documentation:

abstrakte Klasse, die allgemeine Attribute für  
Personenverwaltung enthält

External Documents:

Export Control: Public

Cardinality: n

Hierarchy:

Superclasses: none

Private Interface:

Attributes:

Name  
Adresse  
Telefon  
Geburtstag

Implementation:

Attributes:

Name  
Adresse  
Telefon  
Geburtstag

State machine: No

Concurrency: Sequential

Persistence: Transient

### **Class Name:**

Kunde

Category: Logical View

External Documents:

Export Control: Public

Cardinality: n

Hierarchy:

Superclasses: Person

Associations:

<no rolename> : Auto in association <unnamed>  
<no rolename> : Rechnung in association <unnamed>

Public Interface:

Operations:

Geburtstagswünsche

Private Interface:

Attributes:

Anrede  
Kundennummer

Implementation:

Attributes:

Anrede  
Kundennummer

State machine: No

Concurrency: Sequential

Persistence: Transient

Operation name:

Geburtstagswünsche

Public member of: Kunde

Concurrency: Sequential

**Class Name:**

Mitarbeiter

Category: Logical View

External Documents:

Export Control: Public

Cardinality: n

Hierarchy:

Superclasses: Person

Public Interface:

Operations:  
MA-Nummer zuweisen

Private Interface:

Attributes:

Mitarbeiter-Nummer  
Eintritt  
Arbeitszeit

Implementation:

Attributes:

Mitarbeiter-Nummer  
Eintritt  
Arbeitszeit

State machine: No

Concurrency: Sequential

Persistence: Transient

Operation name:

MA-Nummer zuweisen

Public member of: Mitarbeiter

Concurrency: Sequential

**Class Name:**

Auto

Category: Logical View

External Documents:

Export Control: Public

Cardinality: n

Hierarchy:

Superclasses: none

Associations:

<no rolename> : Kunde in association <unnamed>

<no rolename> : Reparatur in association <unnamed>

<no rolename> : Reparatur in association <unnamed>

Private Interface:

Attributes:

Fahrgestellnummer

Typ

Kundennummer

Implementation:

Attributes:

Fahrgestellnummer

Typ

Kundennummer

State machine: No

Concurrency: Sequential

Persistence: Transient

**Class Name:**

Termin

Category: Logical View

Documentation:

ein Terminobjekt wird erzeugt, wenn der Chefmechaniker die Mechaniker für eine Reparatur eingeteilt hat und existiert solange, wie die Reparatur läuft.

Es beinhaltet die zeitlichen Aspekte des Reparaturprozesses.

Nach Beendigung werden die relevanten Daten in das betriebliche Archivierungssystem eingeschleust.

External Documents:

Export Control: Public

Cardinality: n

Hierarchy:

Superclasses: none

Associations:

<no rolename> : Terminplan in association <unnamed>

<no rolename> : Reparatur in association <unnamed>  
<no rolename> : Mechaniker in association <unnamed>  
Bericht eintragen : Chef-Mechaniker in association <unnamed>

Private Interface:

Attributes:  
Auftragsnummer  
Auftragsdatum

Implementation:

Attributes:  
Auftragsnummer  
Auftragsdatum

State machine: Yes  
Concurrency: Sequential  
Persistence: Transient

State name:  
Einteilung

Type: StartState  
Documentation:  
Chefmechaniker teilt Mechaniker ein

State name:  
Archivierung

Type: EndState

State name:  
Reparatur läuft

Type: Normal  
Documentation:  
die eingeteilten Mechaniker werden im Terminplan als  
belegt angezeigt

State name:  
Reparatur beendet

Type: Normal  
Documentation:  
Zeitpunkt: Erstellung des Reparaturberichts

1. die Mechaniker werden im Terminplan wieder frei

gegeben

2. den Mechanikern wird die Arbeitszeit gutgeschrieben
3. die zeitlichen Daten werden in den Reparaturbericht übernommen

Transition from Einteilung to Reparatur läuft  
nach Eintrag in Terminplan

Transition from Reparatur läuft to Reparatur beendet  
nach Erstellung des Reparaturberichts

Documentation:

der Abstoß für diesen Zustand wird manuell durch das  
Erstellen des Reparaturberichts durch den  
Chefmechaniker getätigt

Transition from Reparatur beendet to Archivierung  
nach Beendigung der Reparatur

Documentation:

als automatisiertes Feature

**Class Name:**

Chef-Mechaniker

Category: Use Case View

External Documents:

Export Control: Public

Cardinality: n

Hierarchy:

Superclasses: Mechaniker

Associations:

<no rolename> : Reparatur planen in association <unnamed>

<no rolename> : Reparaturbericht erstellen in association

<unnamed>

<no rolename> : Termin vereinbaren in association <unnamed>

<no rolename> : Terminplan in association <unnamed>

<no rolename> : Termin in association <unnamed>

Plan eintragen : Reparatur in association <unnamed>

<no rolename> : Reparatur in association <unnamed>

<no rolename> : Mechaniker in association <unnamed>  
<no rolename> : Tätigkeit in association <unnamed>

Public Interface:

Operations:  
    in Plan eintragen  
    MA zuweisen  
    Bericht eintragen

State machine: No  
Concurrency: Sequential  
Persistence: Transient

Operation name:  
    in Plan eintragen

Public member of: Chef-Mechaniker  
Concurrency: Sequential

Operation name:  
    MA zuweisen

Public member of: Chef-Mechaniker  
Concurrency: Sequential

Operation name:  
    Bericht eintragen

Public member of: Chef-Mechaniker  
Concurrency: Sequential

**Class Name:**  
    Mechaniker

Category: Logical View  
External Documents:  
Export Control: Public  
Cardinality: n  
Hierarchy:  
    Superclasses: Mitarbeiter  
Associations:

<no rolename> : Termin in association <unnamed>  
<no rolename> : Chef-Mechaniker in association <unnamed>  
<no rolename> : Tätigkeit in association <unnamed>

Public Interface:  
Operations:

Arbeitszeit anzeigen

Private Interface:

Attributes:  
Stundensatz

Implementation:

Attributes:  
Stundensatz

State machine: No  
Concurrency: Sequential  
Persistence: Transient

Operation name:

Arbeitszeit anzeigen

Public member of: Mechaniker  
Concurrency: Sequential

### ***Class Name:***

Laden

Category: Logical View

External Documents:

Export Control: Public

Cardinality: n

Hierarchy:

Superclasses: none

Associations:

<no rolename> : Lager in association benutzt

<no rolename> : Artikel in association benutzt

Public Interface:

Operations:  
Artikel entnehmen  
Artikel suchen

State machine: No  
Concurrency: Sequential  
Persistence: Transient

Operation name:

Artikel entnehmen

Public member of: Laden

Arguments:  
Artikelnummer  
Anzahl

Documentation:  
Artikel aus dem Lager entnehmen

Concurrency: Sequential

Operation name:  
Artikel suchen

Public member of: Laden  
Documentation:  
suchen von Artikeln im Lager

Concurrency: Sequential

### **Class Name:**

Reparatur

Category: Logical View

Documentation:  
ein Reparaturobjekt wird erzeugt, wenn der  
Chefmechaniker den voraussichtlichen Reparaturplan  
erstellt hat und existiert solange, wie die Reparatur  
läuft.

Es beinhaltet die technischen Aspekte des  
Reparaturprozesses.

Nach Beendigung werden die relevanten Daten in das  
betriebliche Archivierungssystem eingeschleust.

External Documents:

Export Control: Public

Cardinality: n

Hierarchy:

Superclasses: none

Associations:

<no rolename> : Lager in association <unnamed>  
<no rolename> : Termin in association <unnamed>  
<no rolename> : Auto in association <unnamed>  
<no rolename> : Rechnung in association <unnamed>  
<no rolename> : Rechnung in association <unnamed>  
<no rolename> : Chef-Mechaniker in association <unnamed>  
<no rolename> : Chef-Mechaniker in association <unnamed>  
<no rolename> : Auto in association <unnamed>  
<no rolename> : Tätigkeit in association <unnamed>  
<no rolename> : Artikel in association benutzt

Public Interface:

Operations:  
PlanZeit eintragen  
Reparaturnummer zuweisen



KVA erstellen  
eintragen  
Reparatur löschen(Reparaturnummer)

Private Interface:

Attributes:

- Reparaturnummer
- Schadensbeschreibung
- Fahrgestellnummer
  - spezifiziert das reparierte Auto
- PlanZeit
- PlanTeile
- BerichtZeit
- BerichtTeile
- Maximalbetrag

Implementation:

Attributes:

- Reparaturnummer
- Schadensbeschreibung
- Fahrgestellnummer
  - spezifiziert das reparierte Auto
- PlanZeit
- PlanTeile
- BerichtZeit
- BerichtTeile
- Maximalbetrag

State machine: Yes  
Concurrency: Sequential  
Persistence: Transient

Operation name:  
PlanZeit eintragen

Public member of: Reparatur  
Concurrency: Sequential

Operation name:  
Reparaturnummer zuweisen

Public member of: Reparatur  
Concurrency: Sequential

Operation name:  
KVA erstellen

Public member of: Reparatur

Concurrency: Sequential

Operation name:  
eintragen

Public member of: Reparatur  
Concurrency: Sequential

Operation name:  
Reparatur löschen(Reparaturnummer)

Public member of: Reparatur  
Concurrency: Sequential

State name:  
Einteilung

Type: StartState  
Documentation:  
Chefmechaniker gibt voraussichtlich benötigte  
Ersatzteile / Artikel ein

State name:  
Archivierung

Type: EndState

State name:  
Reparatur läuft

Type: Normal

State name:  
Reparatur beendet

Type: Normal  
Documentation:  
Zeitpunkt: Erstellung des Reparaturberichts  
  
1. tatsächlich benötigte Artikel werden aus Bestand  
entfernt  
2. die technischen Daten werden in den  
Reparaturbericht übernommen

Transition from Einteilung to Reparatur läuft  
Beginn der Reparatur

Documentation:  
gleichzeitig mit der Entstehung des Reparaturobjektes

Transition from Reparatur läuft to Reparatur beendet  
Erstellung des Reparaturberichtes

Documentation:  
dieser Prozeßschritt wirdmanuell durch das Erstellen  
des Reparaturberichts durch den Mechaniker angestoßen

Transition from Reparatur beendet to Archivierung  
Documentation:  
als automatisches Feature

**Class Name:**

Rechnung

Category: Logical View

External Documents:

Export Control: Public

Cardinality: n

Hierarchy:

Superclasses: none

Associations:

<no rolename> : Kunde in association <unnamed>  
<no rolename> : Reparatur in association <unnamed>  
<no rolename> : Reparatur in association <unnamed>  
Rechnung erstellen : Bürokraft in association <unnamed>

Private Interface:

Attributes:

Kundennummer

Implementation:

Attributes:

Kundennummer

State machine: No  
Concurrency: Sequential  
Persistence: Transient

**Class Name:**

Terminplan

Category: Logical View

Documentation:

Der Terminplan enthält die anwesenden Mechaniker, die  
der Chefmechaniker für die Reparaturen eingeben kann

External Documents:

Export Control: Public

Cardinality: n

Hierarchy:

Superclasses: none

Associations:

<no rolename> : Termin in association <unnamed>  
in Plan eintragen : Chef-Mechaniker in association <unnamed>  
Rahmenplan eintragen : Bürokraft in association <unnamed>

Public Interface:

Operations:

Zeit belegen  
freieMAanzeigen(MA\_Nummer)  
Reparaturzeit belegen  
anzeigen  
Zeit korrigieren

State machine: Yes

Concurrency: Sequential

Persistence: Transient

Operation name:

Zeit belegen

Public member of: Terminplan

Concurrency: Sequential

Operation name:

freieMAanzeigen(MA\_Nummer)

Public member of: Terminplan

Concurrency: Sequential

Operation name:  
Reparaturzeit belegen

Public member of: Terminplan  
Concurrency: Sequential

Operation name:  
anzeigen

Public member of: Terminplan  
Concurrency: Sequential

Operation name:  
Zeit korrigieren

Public member of: Terminplan  
Concurrency: Sequential

State name:  
Systemeinführung

Type: StartState  
Documentation:  
alle Mechaniker werden erfaßt

State name:  
Rahmendaten

Type: Normal  
Documentation:  
die Bürokratie trägt die Rahmendaten aller Mechaniker  
ein

State name:  
Termine

Type: Normal  
Documentation:  
Der Chefmechaniker teilt die verfügbaren Mechaniker  
für Reparaturen ein  
  
die Mechaniker werden für den entsprechenden Zeitraum  
als belegt gemeldet

State name:  
Reparatur erledigt

Type: Normal

Documentation:  
Die betroffenen Mechaniker werden wieder frei gegeben

State name:  
Systemstop

Type: EndState

Transition from Systemeinführung to Rahmendaten

Transition from Rahmendaten to Termine  
Reparaturauftrag

Transition from Termine to Reparatur erledigt  
Auftrag erledigen

Documentation:  
normale Aufgabenerledigung

Transition from Reparatur erledigt to Termine  
ändern

Documentation:  
Möglichkeit der Umverteilung durch Chefmechaniker

Transition from Reparatur erledigt to Rahmendaten  
Arbeitszeiten angeben

Documentation:  
die Arbeitszeiten werden den Mechanikern gutgeschrieben

**Class Name:**  
Lager

Category: Logical View  
Documentation:  
enthält die Artikelnummern aller vorhandenen Artikel

External Documents:  
Export Control: Public

Cardinality: n  
Hierarchy:  
Superclasses: none  
Associations:

<no rolename> : Reparatur in association <unnamed>  
<no rolename> : Bürokraft in association <unnamed>  
<no rolename> : Artikel in association <unnamed>  
<no rolename> : Laden in association benutzt  
<no rolename> : Artikel in association <unnamed>  
<no rolename> : Bürokraft in association Inventur

Private Interface:  
Attributes:  
Artikelnummer

Implementation:  
Attributes:  
Artikelnummer

State machine: No  
Concurrency: Sequential  
Persistence: Transient

**Class Name:**  
Artikel

Category: Logical View  
Documentation:  
beinhaltet die Attribute jeweils eines Artikels /  
Ersatzteils

External Documents:  
Export Control: Public  
Cardinality: n  
Hierarchy:  
Superclasses: none  
Associations:

<no rolename> : Lieferant in association <unnamed>  
<no rolename> : Lager in association <unnamed>  
<no rolename> : Laden in association benutzt  
s  
wird generiert : Bestellvorschlag in association <unnamed>  
<no rolename> : Lager in association <unnamed>  
<no rolename> : Reparatur in association benutzt

<no rolenam> : Bestellung in association <unnamed>



<no rolename> : Bürokräft in association Kontrolle  
<no rolename> : Bestellvorschlag in association System macht

Private Interface:

Attributes:  
Bezeichnung : String  
min-Bestand : Integer  
max-Bestand : Integer  
Bestand  
Artikelnummer

Implementation:

Attributes:  
Bezeichnung : String  
min-Bestand : Integer  
max-Bestand : Integer  
Bestand  
Artikelnummer

State machine: No  
Concurrency: Sequential  
Persistence: Transient

**Class Name:**

Bestellung

Category: Logical View

External Documents:

Export Control: Public

Cardinality: n

Hierarchy:

Superclasses: none

Associations:

<no rolename> : Bürokräft in association <unnamed>  
<no rolename> : Bürokräft in association <unnamed>  
<no rolename> : Artikel in association <unnamed>  
<no rolename> : Bestellvorschlag in association <unnamed>

Private Interface:

Attributes:  
Artikel  
Anzahl

Implementation:

Attributes:  
Artikel  
Anzahl

State machine: No  
Concurrency: Sequential  
Persistence: Transient

**Class Name:**

Lieferant

Category: Logical View

External Documents:

Export Control: Public

Cardinality: n

Hierarchy:

Superclasses: none

Associations:

<no rolename> : Artikel in association <unnamed>

<no rolename> : Bestellvorschlag in association System prüft

Private Interface:

Attributes:

Name

Artikel

Anschrift

Konditionen

Implementation:

Attributes:

Name

Artikel

Anschrift

Konditionen

State machine: No

Concurrency: Sequential

Persistence: Transient

**Class Name:**

Bestellvorschlag

Category: Logical View

External Documents:

Export Control: Public

Cardinality: n

Hierarchy:

Superclasses: none

Associations:

wird generiert : Artikel in association <unnamed>

<no rolename> : Artikel in association System macht

<no rolename> : Bestellung in association <unnamed>

<no rolename> : Lieferant in association System prüft

<no rolename> : Bürokräft in association Bürokräft stimmt zu

Public Interface:

Operations:

Bestellvorschlag anzeigen

Private Interface:

Attributes:  
     Lieferant  
     Artikelnummer

Implementation:  
     Attributes:  
         Lieferant  
         Artikelnummer

State machine: No  
 Concurrency: Sequential  
 Persistence: Transient

Operation name:  
     Bestellvorschlag anzeigen

Public member of: Bestellvorschlag  
 Concurrency: Sequential

**Class Name:**

Bürokraft

Category: Use Case View  
 External Documents:  
 Export Control: Public  
 Cardinality: n  
 Hierarchy:  
     Superclasses: Mitarbeiter  
 Associations:

<no rolename> : Rechnung erstellen in association <unnamed>  
 <no rolename> : Lagerbestand verwalten in association <unnamed>  
 <no rolename> : Ersatzteil verwalten in association <unnamed>  
 <no rolename> : Lieferant verwalten in association <unnamed>  
 <no rolename> : Bestellung erstellen in association <unnamed>  
 <no rolename> : Mitarbeiter verwalten in association <unnamed>  
 <no rolename> : Kunden verwalten in association <unnamed>  
 <no rolename> : Autos verwalten in association <unnamed>  
 <no rolename> : Lager in association <unnamed>  
 <no rolename> : Bestellung in association <unnamed>  
 <no rolename> : Bestellung in association <unnamed>  
 <no rolename> : Rechnung in association <unnamed>  
 <no rolename> : Terminplan in association <unnamed>  
 <no rolename> : Lager in association Inventur  
 <no rolename> : Artikel in association Kontrolle  
 <no rolename> : Bestellvorschlag in association Bürokraft stimmt

zu

Public Interface:  
 Operations:  
     Mechniker neu erfassen  
     Lohn auszahlen

Bürokratie neu erfassen

Gehalt auszahlen  
freie Mechaniker eintragen  
Rechnung erstellen  
macht Bestellung  
Inventur machen

Private Interface:

Attributes: Monatsgehalt

Implementation:

Attributes: Monatsgehalt

State machine: No

Concurrency: Sequential

Persistence: Transient

Operation name:

Mechniker neu erfassen

Public member of: Bürokraft

Arguments:

Eintrittsdatum

Concurrency: Sequential

Operation name:

Lohn auszahlen

Public member of: Bürokraft

Concurrency: Sequential

Operation name:

Bürokraft neu erfassen

Public member of: Bürokraft

Concurrency: Sequential

Operation name:

Gehalt auszahlen

Public member of: Bürokraft

Concurrency: Sequential

Operation name:

freie Mechaniker eintragen

Public member of: Bürokraft  
Concurrency: Sequential

Operation name:  
Rechnung erstellen

Public member of: Bürokraft  
Concurrency: Sequential

Operation name:  
macht Bestellung

Public member of: Bürokraft  
Concurrency: Sequential

Operation name:  
Inventur machen

Public member of: Bürokraft  
Concurrency: Sequential

Association:

Documentation:  
nur Aggregation, da Autos auch ohne den Kunden weiter  
gespeichert werden.

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Auto  
Cardinality / Multiplicity: 1..n  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Kunde  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: Yes

Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Termin  
Cardinality / Multiplicity: n  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified  
Constraints:  
t != 1

Role: Bericht eintragen  
Class: Chef-Mechaniker  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Termin  
Cardinality / Multiplicity: n  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public

Containment: Unspecified

Role:

Class: Mechaniker  
Cardinality / Multiplicity: n  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:

Class: Chef-Mechaniker  
Cardinality / Multiplicity: n  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:

Class: Mechaniker  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:

Class: Termin  
Cardinality / Multiplicity: 1  
Navigable: Yes



Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Reparatur  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Reparatur  
Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Auto  
Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Chef-Mechaniker  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role: Plan eintragen  
Class: Reparatur  
Cardinality / Multiplicity: n  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified  
Constraints:  
t = 1

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Reparatur  
Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Chef-Mechaniker  
Cardinality / Multiplicity:  
Navigable: No  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Kunde  
Cardinality / Multiplicity: 1..n  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Rechnung  
Cardinality / Multiplicity: n  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Rechnung  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Reparatur  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Reparatur  
Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Rechnung  
Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Terminplan  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Termin  
Cardinality / Multiplicity: n  
Navigable: Yes  
Aggregate: No

Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>

Association Class: none

Role:  
Class: Terminplan  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified  
Constraints:  
t=1

Role: in Plan eintragen  
Class: Chef-Mechaniker  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:  
benutzt

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Lager  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public

Containment: Unspecified

Role:

Class: Laden  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:

Class: Artikel  
Cardinality / Multiplicity: n  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:

Class: Lager  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:  
benutzt

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:

Class: Artikel  
Cardinality / Multiplicity: n  
Navigable: Yes

Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Laden  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Lager  
Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: Yes  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Artikel  
Cardinality / Multiplicity: 1..n  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: By Value

Association:  
benutzt

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Artikel  
Cardinality / Multiplicity: n  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Reparatur  
Cardinality / Multiplicity: n  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:  
System macht

Documentation:  
das System macht einen Bestllvorschlag für den  
jeweiligen Artikel unter Berücksichtigung des  
günstigsten Lieferanten

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Bestellvorschlag  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Artikel  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified



Association:

Derived: No

Direction: <non-directional>

Association Class: none

Role:

Class: Bestellung  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:

Class: Bestellvorschlag  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

System prüft

Documentation:

System nimmt günstigsten Lieferanten auf

Derived: No

Direction: <non-directional>

Association Class: none

Role:

Class: Lieferant  
Cardinality / Multiplicity: n  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:

Class: Bestellvorschlag  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No

Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role: Rechnung erstellen  
Class: Bürokraft  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Rechnung  
Cardinality / Multiplicity: n  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Terminplan  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role: Rahmenplan eintragen  
Class: Bürokraft

Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:  
Inventur

Documentation:  
wird in bestimmten Abständen durchgeführt.

Sinn: Berichtigung der Artikelbestände durch nachzählen

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Bürokräft  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Lager  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:  
Kontrolle

Documentation:  
Artikelbestand wird kontrolliert.

angestoßen:  
a) manuell durch Bürokräft  
b) automatisch durch Unter-/Überschreitung  
des Min-/Max-Bestandes des Artikels

Sinn: Nachbestellungen managen

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Artikel  
Cardinality / Multiplicity: n  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Bürokraft  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:  
Bürokraft stimmt zu

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Class: Bestellvorschlag  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Bürokraft  
Cardinality / Multiplicity: 1  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

**Class Name:**

Chef-Mechaniker

Category: Use Case View

External Documents:

Export Control: Public

Cardinality: n

Hierarchy:

Superclasses: Mechaniker

Associations:

<no rolename> : Reparatur planen in association <unnamed>

<no rolename> : Reparaturbericht erstellen in association

<unnamed>

<no rolename> : Termin vereinbaren in association <unnamed>

<no rolename> : Terminplan in association <unnamed>

<no rolename> : Termin in association <unnamed>

Plan eintragen : Reparatur in association <unnamed>

<no rolename> : Reparatur in association <unnamed>

<no rolename> : Mechaniker in association <unnamed>

<no rolename> : Tätigkeit in association <unnamed>

Public Interface:

Operations:

in Plan eintragen

MA zuweisen

Bericht eintragen

State machine: No

Concurrency: Sequential

Persistence: Transient

Operation name:

in Plan eintragen

Public member of: Chef-Mechaniker

Concurrency: Sequential

Operation name:

MA zuweisen

Public member of: Chef-Mechaniker

Concurrency: Sequential

Operation name:

Bericht eintragen



Public member of: Chef-Mechaniker  
Concurrency: Sequential

**Class Name:**

Bürokraft

Category: Use Case View

External Documents:

Export Control: Public

Cardinality: n

Hierarchy:

Superclasses: Mitarbeiter

Associations:

<no rolename> : Rechnung erstellen in association <unnamed>  
<no rolename> : Lagerbestand verwalten in association <unnamed>  
<no rolename> : Ersatzteil verwalten in association <unnamed>  
<no rolename> : Lieferant verwalten in association <unnamed>  
<no rolename> : Bestellung erstellen in association <unnamed>  
<no rolename> : Mitarbeiter verwalten in association <unnamed>  
<no rolename> : Kunden verwalten in association <unnamed>  
<no rolename> : Autos verwalten in association <unnamed>  
<no rolename> : Lager in association <unnamed>  
<no rolename> : Bestellung in association <unnamed>  
<no rolename> : Bestellung in association <unnamed>  
<no rolename> : Rechnung in association <unnamed>  
<no rolename> : Terminplan in association <unnamed>  
<no rolename> : Lager in association Inventur  
<no rolename> : Artikel in association Kontrolle  
<no rolename> : Bestellvorschlag in association Bürokräft stimmt

zu

Public Interface:

Operations:

Mechaniker neu erfassen  
Lohn auszahlen  
Bürokraft neu erfassen  
Gehalt auszahlen  
freie Mechaniker eintragen  
Rechnung erstellen  
macht Bestellung  
Inventur machen

Private Interface:

Attributes:

Monatsgehalt

Implementation:

Attributes:

Monatsgehalt

State machine: No

Concurrency: Sequential

Persistence: Transient

Operation name:  
    Mechniker neu erfassen

Public member of:    Bürokraft  
Arguments:  
    Eintrittsdatum

Concurrency:    Sequential

Operation name:  
    Lohn auszahlen

Public member of:    Bürokraft  
Concurrency:    Sequential

Operation name:  
    Bürokraft neu erfassen

Public member of:    Bürokraft  
Concurrency:    Sequential

Operation name:  
    Gehalt auszahlen

Public member of:    Bürokraft  
Concurrency:    Sequential

Operation name:  
    freie Mechaniker eintragen

Public member of:    Bürokraft  
Concurrency:    Sequential

Operation name:  
    Rechnung erstellen

Public member of:    Bürokraft  
Concurrency:    Sequential

Operation name:  
    macht Bestellung

Public member of:    Bürokraft  
Concurrency:    Sequential



Operation name:  
Inventur machen

Public member of: Bürokraft  
Concurrency: Sequential

Package name:  
Kunden- und Personalverwaltung

External Documents:  
Global: No

Package name:  
Reparaturprozeß

External Documents:  
Global: No

Package name:  
Lagerverwaltung

External Documents:  
Global: No

Use Case name:  
Kostenvoranschlag erstellen

Category: Reparaturprozeß  
External Documents:  
Abstract: No  
State machine: No  
Associations:

<no rolename> : Reparatur planen in association <unnamed> (uses)

Use Case name:  
Reparatur planen

Category: Reparaturprozeß  
External Documents:  
Abstract: No  
State machine: No  
Associations:

<no rolename> : Kostenvoranschlag erstellen in association  
<unnamed> (uses)

<no rolename> : Chef-Mechaniker in association <unnamed>

Use Case name:  
Reparaturbericht erstellen

Category: Reparaturprozeß  
External Documents:  
Abstract: No  
State machine: No  
Associations:

<no rolename> : Chef-Mechaniker in association <unnamed>

Use Case name:  
Termin vereinbaren

Category: Reparaturprozeß  
External Documents:  
Abstract: No  
State machine: No  
Associations:

<no rolename> : Chef-Mechaniker in association <unnamed>  
<no rolename> : Kunden verwalten in association <unnamed> (uses)  
<no rolename> : Autos verwalten in association <unnamed> (uses)

Use Case name:  
Rechnung erstellen

Category: Reparaturprozeß  
External Documents:  
Abstract: No  
State machine: No  
Associations:

<no rolename> : Bürokraft in association <unnamed>

Use Case name:  
Lagerbestand verwalten

Category: Lagerverwaltung  
External Documents:  
Abstract: No  
State machine: No

Associations:

<no rolename> : Bürokraft in association <unnamed>

Use Case name:

Ersatzteil verwalten

Category: Lagerverwaltung

External Documents:

Abstract: No

State machine: No

Associations:

<no rolename> : Bürokraft in association <unnamed>

Use Case name:

Lieferant verwalten

Category: Lagerverwaltung

External Documents:

Abstract: No

State machine: No

Associations:

<no rolename> : Bürokraft in association <unnamed>

Use Case name:

Bestellung erstellen

Category: Lagerverwaltung

External Documents:

Abstract: No

State machine: No

Associations:

<no rolename> : Bürokraft in association <unnamed>

Use Case name:

Mitarbeiter verwalten

Category: Kunden- und Personalverwaltung

External Documents:

Abstract: No

State machine: No

Associations:

<no rolename> : Bürokraft in association <unnamed>

Use Case name:

Kunden verwalten

Category: Kunden- und Personalverwaltung

External Documents:

Abstract: No

State machine: No

Associations:

<no rolename> : Termin vereinbaren in association <unnamed>

(uses)

<no rolename> : Bürokraft in association <unnamed>

Use Case name:

Autos verwalten

Category: Kunden- und Personalverwaltung

External Documents:

Abstract: No

State machine: No

Associations:

<no rolename> : Termin vereinbaren in association <unnamed>

(uses)

<no rolename> : Bürokraft in association <unnamed>

Association:

Stereotype: uses

Derived: No

Direction: <non-directional>

Association Class: none

Role:

Use Case: Kostenvoranschlag erstellen

Cardinality / Multiplicity:

Navigable: Yes

Aggregate: No

Static: No

Friend: No

Access: Public

Containment: Unspecified

Role:

Use Case: Reparatur planen  
Cardinality / Multiplicity:  
Navigable: No  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Use Case: Reparatur planen  
Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Chef-Mechaniker  
Cardinality / Multiplicity:  
Navigable: No  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Use Case: Reparaturbericht erstellen  
Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No

Access: Public  
Containment: Unspecified

Role:  
Class: Chef-Mechaniker  
Cardinality / Multiplicity:  
Navigable: No  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Use Case: Termin vereinbaren  
Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Chef-Mechaniker  
Cardinality / Multiplicity:  
Navigable: No  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Stereotype: uses  
Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Use Case: Kunden verwalten

Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Use Case: Termin vereinbaren  
Cardinality / Multiplicity:  
Navigable: No  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Stereotype: uses  
Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Use Case: Autos verwalten  
Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Use Case: Termin vereinbaren  
Cardinality / Multiplicity:  
Navigable: No  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No

Direction: <non-directional>  
Association Class: none

Role:  
  Use Case: Rechnung erstellen  
  Cardinality / Multiplicity:  
  Navigable: Yes  
  Aggregate: No  
  Static: No  
  Friend: No  
  Access: Public  
  Containment: Unspecified

Role:  
  Class: Bürokraft  
  Cardinality / Multiplicity:  
  Navigable: No  
  Aggregate: No  
  Static: No  
  Friend: No  
  Access: Public  
  Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
  Use Case: Lagerbestand verwalten  
  Cardinality / Multiplicity:  
  Navigable: Yes  
  Aggregate: No  
  Static: No  
  Friend: No  
  Access: Public  
  Containment: Unspecified

Role:  
  Class: Bürokraft  
  Cardinality / Multiplicity:  
  Navigable: No  
  Aggregate: No  
  Static: No  
  Friend: No  
  Access: Public  
  Containment: Unspecified



Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:

Use Case: Ersatzteil verwalten  
Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:

Class: Bürokraft  
Cardinality / Multiplicity:  
Navigable: No  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:

Use Case: Lieferant verwalten  
Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:

Class: Bürokraft  
Cardinality / Multiplicity:  
Navigable: No  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Use Case: Bestellung erstellen  
Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Bürokraft  
Cardinality / Multiplicity:  
Navigable: No  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Use Case: Mitarbeiter verwalten  
Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Bürokraft  
Cardinality / Multiplicity:  
Navigable: No  
Aggregate: No

Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Use Case: Kunden verwalten  
Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:  
Class: Bürokraft  
Cardinality / Multiplicity:  
Navigable: No  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Association:

Derived: No  
Direction: <non-directional>  
Association Class: none

Role:  
Use Case: Autos verwalten  
Cardinality / Multiplicity:  
Navigable: Yes  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Role:

Class: Bürokraft  
Cardinality / Multiplicity:  
Navigable: No  
Aggregate: No  
Static: No  
Friend: No  
Access: Public  
Containment: Unspecified

Object name:

Class: Bürokraft  
Persistence: Transient

Object name:

Class: Artikel  
Persistence: Transient

Object name:

Class: Bestellung  
Persistence: Transient

Object name:

Class: Bestellvorschlag  
Persistence: Transient

Object name:

Class: Reparatur  
Persistence: Transient

Object name:

Class: Laden

Persistence: Transient

Object name:  
hallo

Class: Tätigkeit  
Persistence: Transient

Object name:

Class: Chef-Mechaniker  
Persistence: Transient

Object name:

Class: Kunde  
Persistence: Transient

Object name:

Class: Terminplan  
Persistence: Transient

Object name:

Class: Termin  
Persistence: Transient

Object name:

Documentation:  
das auslösende Ereignis für Kundendatenverwaltung ist  
eine Terminvereinbarung, gemacht durch die Bürokraft

Class: Bürokraft  
Persistence: Transient

Object name:

Class: Kunde  
Persistence: Transient

Object name:

Class: Auto  
Persistence: Transient

Object name:

Class: Bürokraft  
Persistence: Persistent

Object name:

Class: Mechaniker  
Persistence: Transient

Object name:

Class: Terminplan  
Persistence: Transient

Object name:

Class: Bürokraft  
Persistence: Transient

Object name:

Class: Artikel  
Persistence: Transient

Object name:

Class: Lager  
Persistence: Transient

Object name:

Class: Chef-Mechaniker  
Persistence: Transient

Object name:

Class: Reparatur  
Persistence: Transient

Object name:

Class: Terminplan  
Persistence: Transient

Object name:

Class: Termin  
Persistence: Transient

Object name:

Class: Chef-Mechaniker  
Persistence: Transient

Object name:

Class: Reparatur  
Persistence: Transient

Object name:

Class: Rechnung  
Persistence: Transient

Object name:

Class: Bürokraft  
Persistence: Transient

Object name:

Class: Termin  
Persistence: Transient